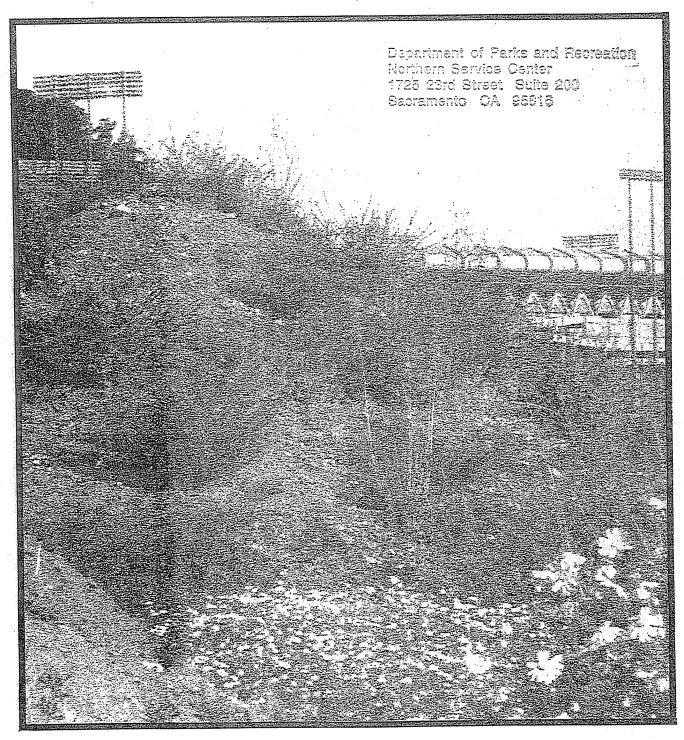
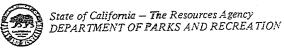
CANDLESTICK POINT STATE RECREATION AREA General Plan

State Park and Recreation Commission Approval November 1978 Amended May 1987





March 1988

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CANDLESTICK POINT
STATE RECREATION AREA

GENERAL PLAN AMENDMENT

March 1988

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EPARTMENT OF PARKS AND RECREATION

TATE PARK AND RECREATION COMMISSION

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Resolution 28-87
adopted by the
CALIFORNIA STATE PARK AND RECREATION COMMISSION
at its regular meeting in San Francisco on
May 8, 1987

WHEREAS, the Director of the Department of Parks and Recreation has presented to this Commission for approval the proposed Candlestick Point State Recreation Area General Plan Amendment; and

WHEREAS, this reflects long-range development plans to provide for optimum use and enjoyment of the unit as well as the protection of its quality;

NOW, THEREFORE, BE IT RESOLVED that the State Park and Recreation Commission approves the Department of Parks and Recreation's Candlestick Point State Recreation Area General Plan Amendment, Preliminary dated February 1987, subject to such environmental changes as the Director of Parks and Recreation shall determine advisable and necessary to implement the provisions and objectives of said plan.

BE IT FURTHER RESOLVED that:

- 1. A paragraph entitled <u>Wind Surfing Facilities</u> will be added to page 36 and staff will work closely with wind surfer users groups to develop appropriate facilities compatible with other park users, and significant improvements shall be provided for a safer parking access and shoreline for wind surfing activities.
- 2. At the end of the first paragraph under <u>Boating</u> <u>Center</u>, add: "such as Hawaiian, Samoan, etc."
- 3. A final paragraph on page 43 will read: "Department staff will work closely with local authorities to improve transportation access to the area by new roads, ferry boats, etc., and to provide year-round access to the park for all recreational users, including during the football and baseball season."

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Preface

The original plan for Candlestick Point State Recreation Area was approved by the State Park and Recreation Commission in November 1978. The plan has provided an inspirational guiding philosophy for millions of dollars worth of development, and has opened the bayshore to public use and access with real community participation.

The text has been reorganized, but many portions have been left intact. The Appendix and Foreword have not been altered because they are as appropriate now as they were when written in 1978.

Candlestick Point State Recreation Area is a window providing millions of bay area residents a view into the State Park System.

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Foreword

(dated June 1978)

The existence of Candlestick Point State Recreation Area as a unit of the State Park System is a giant stride forward. It demonstrates the state's commitment to making its park resources more available to the people.

Candlestick Point is located in one of California's major population centers, and is readily accessible to about four million citizens. It is now a narrow stretch of depleted and abused land that forms part of the magnificent San Francisco Bay.

This wasted land is about to undergo a major transition.

The staff of the Department of Parks and Recreation takes pride in participating in this innovative effort. Although it is a departure from the traditional roles of the State Park System, you will note as your read this plan that the standards and ideals of the system have not been compromised.

Because of information acquired during the planning activity for Candlestick Point, we now know that the state can play an urban parks role that does not duplicate the efforts of local government. We can develop urban parks that will attract citizens from across the state and, also, will meet local needs. And we know that the quality and standards of the State Park System can be upheld and even strengthened by these efforts.

To develop or restore a park unit requires wisdom and foresight, and a positive attitude about our limited resources, the scarcity of open space, and recreational opportunities in urban areas.

State park planners have demonstrated their sensitivity to the needs of those closest to Candlestick Point-rthe local communities. The planning approach has considered both the socioeconomic and psychological factors of the communities, and the expanded roles of recreation providers in dealing with these factors.

The planners have expressed to the department's executive staff their hope that development of Candlestick Point will create jobs for local residents.

The unemployment rate in the Bayview/Hunter's Point communities is high, and it would be appropriate to provide these opportunities to work.

Community residents have suggested that their economic involvement should go beyond jobs, giving local business people the responsibility of contracting with the state to provide visitor services.

Employment opportunities could be created through: (1) construction of state recreation facilities, (2) maintenance of these facilities, and (3) operation of programs in these facilities.

The department will take these concerns seriously as development of Candlestick Point gets underway.

Creation of state urban parks is a commitment to California's citizens. This General Development Plan is our first step toward setting standards of state significance for urban recreation efforts. It is the beginning of an important evolutionary process--building parks for people.

We wish to thank the members of the planning team for their dedication to a document that will convert the ordinary into something extraordinary—the Candlestick Point State Recreation Area General Development Plan.

Alice Wright-Cottingim Chief Deputy Director Department of Parks and Recreation

SUMMARY

This document provides resource management policies and development proposals for Candlestick Point State Recreation Area, the State Park System's first urban development. Located on the shore of the San Francisco Bay, this recreation area represents a new direction for recreation planning. Its statewide significance stems from the fact that Candlestick Point is part of the state's largest estuarine system.

Candlestick Point is unique because it is situated on landfill, which was artificially created to provide a location for a U.S. Navy shipyard during World War II. This condition has required that plans for development be tailored to the landfill's characteristics. Before this human intervention, the location consisted of marsh lands and mudflats, and it is slowly and naturally returning to that state.

Candlestick Point SRA can potentially serve some four million residents of the San Francisco Bay Area, in addition to serving people from other areas of the state. However, its primary impact will be on local residents.

This plan calls for development of a 155-acre recreation area that will . provide many different kinds of visitor experiences.

Picnicking and boating are high-priority recreational activities. The plan calls for several picnic areas, including one for groups of disabled persons. Docks are proposed for both powered and non-powered watercraft.

Other priorities are camping and day use activities. Two group campgrounds are proposed, as well as a cultural program center and a nature education center.

Four fishing piers are proposed to improve current fishing conditions in the area.

Hiking and bicycling trails are also proposed, so visitors can enjoy the scenic beauty of the site without using motorized transportation.

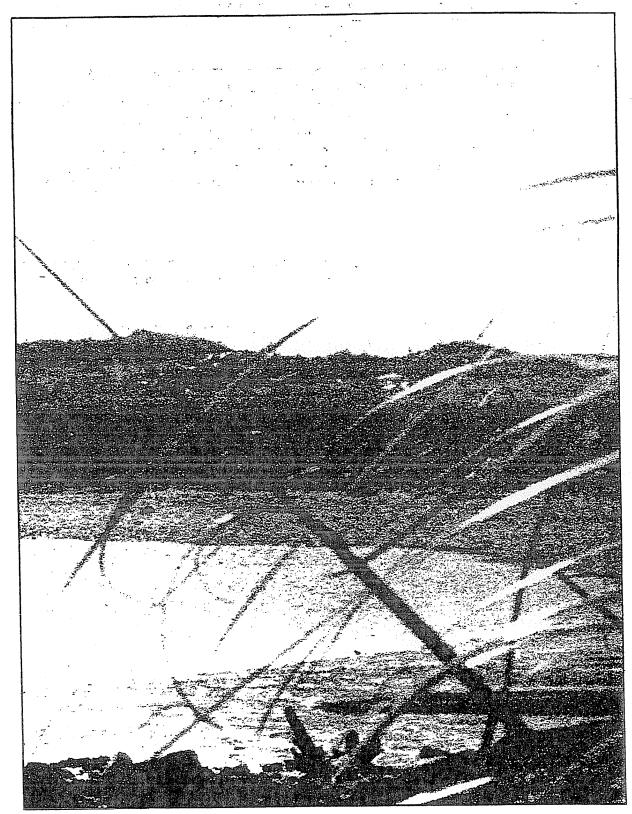
The plan recommends that the Department of Parks and Recreation work with public transportation providers in the bay area to provide adequate transit facilities—including bus, rail and possibly ferry service—to Candlestick Point.

The basic philosophy behind this plan is public involvement. It has been an integral part of the planning process. The plan recommends that local residents aid in the decisions and provide the human resources that will make Candlestick Point SRA a successful experience.

Marshlands are like cities to wildlife, for they support a high density and variety of species.

John B. Cowan Wildlife Manager-Biologist California Department of Fish and Game

INTRODUCTION



Purpose of Plan

In April 1977, Candlestick Point was classified by the California State Park and Recreation Commission as a state recreation area. The purpose of this plan is to provide general guidelines for all area development and management, in accordance with this classification.

The plan is the beginning guideline of a continuing process. It began with an inventory of the San Francisco Bay's natural, cultural, and recreational resources, and human influences. It then moved into development of plans for future use, and the compatibility of the land and water with the recreational facilities in public demand. This document reflects this part of the process—the policies, future guidelines, and conceptual desires for a recreational area. The general planning process does not end here, but continues to grow flexibily, as more information is gathered and the urban recreation area develops.

The specific objectives of the plan are:

- To add to the improvement of the quality of urban life, and to instill a sense of response, recognition, and pride in the environment around a city.
- 2. To identify and understand the ecological life cycles of the San Francisco Bay frontage and its natural and cultural resources, and to create on this site the State Park System's celebration of the San Francisco Bay.
- 3. To identify the surrounding influences on the site and the recreational and human resources of the San Francisco Bay Area.
- 4. To provide public accessibility to the shoreline of the San Francisco Bay.
- 5. To expand visitor experiences so visitors can reflect, appreciate, and enjoy the natural, cultural, recreational, and human resources.
- 6. To identify the need for paid and voluntary public participation in building, maintaining, and programming the unit facilities.
- 7. To establish policies for management, protection, and interpretation of the resources.
- 8. To identify lands outside the existing park boundaries that would be valuable additions to the unit.
- 9. To make recommendations for additional studies beyond the scope of this document.
- 10. To determine the potential environmental impacts of these visitor activities and land uses.
- 11. To provide an informal document for the public, the legislature, park personnel, and other government agencies.

Statewide Significance

Candlestick Point State Recreation Area is of statewide significance because it is the first State Park System unit purposely acquired to bring State Park System values into an urban setting.

The statewide significance of an acreage and shoreline on the biggest and most significant estuarine system in California is the most obvious factor. Candlestick Point SRA, with its bay shoreline, is less than one hour away from millions of urban dwellers; this is certainly a major attribute to statewide significance.

Candlestick Point SRA enables the State Park System to extend recreational and cultural facilities to urban areas, where opportunities for access to the system have traditionally been limited. Making the system available in an urban setting relates urban dwellers to the natural environment. The dependents of that relationship can be demonstrated by programs that understand the city as an ecosystem, different than, but part of, the natural ecosystem of the SRA.

Project Description

Candlestick Point State Recreation Area is located in the southeast part of the city and county of San Francisco, and the northeast part of San Mateo County. The project is accessible by walking, biking, boating, auto, and bus from residential, industrial, and commercial areas of the bay area and the peninsula.

Access is from Highway 101 (Bayshore Freeway) and city streets. The project includes about 155 acres, and about 3-1/4 miles of San Francisco Bay shoreline. The project boundary abuts the United States Navy Shipyard at the furthest northern border, and the San Mateo County line to the south. The project is directly across the street from the San Francisco Executive Park, Candlestick Stadium, and the Alice Griffith Housing project.

Historical Background

<u>History of the Land</u>

The name of the project originated with the naming of a small rock and outcropping near the site by the U.S. Coast Survey in the 1800s. This rocky pinnacle resembled a candlestick; it is believed to have been located on land now occupied by Candlestick Stadium.

In 1868, the state legislature approved an act "to survey and dispose of certain San Francisco Bay salt marsh and tidelands belonging to the State of California." The act was the basis for public and private development along the San Francisco Bay waterfront. This included establishment of the block pattern in the tidelands, and the "reservation of streets, docks, piers, canals, basins and other use necessary for public convenience and the purposes of commerce."

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In November 1940, the U.S. Government purchased the 48.6-acre Hunter's Point Shipyard from Bethlehem Steel. A year later, following the declaration of war, the U.S. Navy began a program of rapid expansion. Hills on the site were leveled to more flat industrial land, and the residue was used to fill the surrounding tidelands for further expansion of the shipyard. By the end of World War II, there were more than 500 acres of land in the shipyard.

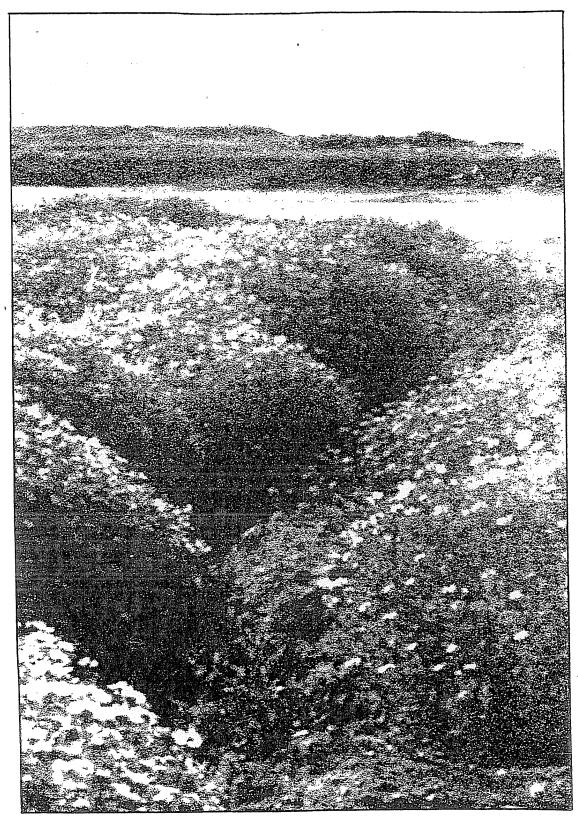
The shoreline below the shipyard in the south basin and Candlestick Point had remained virtually undisturbed for 90 years. The coves and beaches along the shore, where people could fish, picnic, and play at the water's edge, were a source of pleasure, and a great asset to the area.

A major land use change during this period was the construction of Candlestick Stadium and its parking lot, and the haphazard filling of the adjacent tidelands in the Hunter's Point Reclamation District. The fill for the parking lot allowed access, to reach and fill tidelots further out in the bay. This fill activity turned the shoreline into the uninviting wasteland of junkyards and dump sites that was purchased by the State of California for Candlestick Point State Recreation Area.

The entire proposed recreation area is situated on land fill.

Two major problems must be expected due to the poor quality of the fill. The first of these is the potential leaching of undesirable materials into the bay; the second is settlement of the land fill due to structural instability.

RESOURCE ELEMENT



Unit Identification

Candlestick Point State Recreation Area comprises approximately 63 hectares (155 acres), located along the western shoreline of the San Francisco Bay. The area encircles Candlestick Stadium on the south, east, and north sides.

The area was classified by the State Park and Recreation Commission as a state recreation area, since it is capable of withstanding extensive human impact. It is close to large centers of population and major routes of travel; it has proven recreational resources; and it can be developed and operated to provide many outdoor recreational and interpretive opportunities in the San Francisco Bay, its surroundings, and the bay ecosystem.

Resource objectives will be to use the many recreational features and resources of the San Francisco Bay and shoreline in the recreation area for the use and enjoyment of the people of the state. Resources present now, or those that may become established or developed, will be managed and protected so they will be perpetuated for future generations to enjoy.

Resource Inventory

A resource inventory for any area is an inventory of all resources present in the area. It may include all plants, animals, and other features (including cultural) which make up the past or present environment, or can affect or modify it. Maintenance of the inventory is a never-ending process.

Information about the area and the adjacent bay is being compiled by the department, and can be found in the files of the Resource Protection Division.

Resource Evaluation

The land area of the unit, except for one very small area, is all fill material that has been placed over the natural bay deposits. This material is subject to subsidence, since the bay bottom contains unconsolidated muds and silts that are vulnerable to any type of movement. Subsidence can be caused by: (1) actual compaction of the bay mud units, or (2) lateral spreading of the fill and/or mud.

The first almost always occurs. The second occurs primarily where the fill and/or mud has a steep margin.

The State Division of Mines and Geology has made recommendations to various agencies in the past regarding the filling of bay lands, and construction on these fills. Specific charts describe the expected amount of settlement with the passage of time. If the fill has been in place for 5 or 10 years, one could expect that most, but not all, of the settlement has taken place.

Information needed to determine how much settlement will occur includes depth to bedrock (or base of bay mud), thickness of the fill, and length of time the fill has been in place.

Large earthquakes can be expected to occur near the site, since the closest known active fault, the San Andreas, lies only 11 kilometers (7 miles) to the southwest. Several other known active faults are close enough to cause severe damage. Large earthquakes can cause liquefaction, lateral spreading, and even massive ground collapse (such as the Turnegan Heights landslide in Anchorage, Alaska, in 1964). Earthquakes could also cause water movement in the bay that could inundate the adjacent low-lying lands.

The unit is next to the Bayview community and the San Francisco Bay. The Bayview community adds an element of walk-in accessibility to the state facility. The unit also has areas of physical isolation from residences. These areas of seclusion are enhanced by distant views of San Bruno Mountain, the East Bay Hills, and the San Francisco Bay, which impart a relaxing sense of solitude. Enjoyment of the striking panoramic views, and direct contact with the San Francisco Bay, are also enhanced by the relatively good weather characteristic of this locale. Winds experienced in the area tend to be gusty and quite strong at times.

Natural Values

The natural environment of significance is the San Francisco Bay itself. Although the present shoreline is a fill with a rapid drop-off, there is a narrow fringe of wetland habitat that supports some marsh grasses and pickleweed. Introduced ornamental shrubs are found farther back on the fill. The fill, faced with rock riprap, is most apparent at low tide, as the steep sides drop abruptly into the bay mud and sand. In the mud and sand beds are a number of invertebrates, including soft shell and bent nosed clams, ghost shrimp, marine worms, and many other small animals.

Oysters and other invertebrates are found on the rocks along the shoreline. All of these invertebrates are important to the bay ecosystem. Additionally, the bay water provides a habitat for a number of fish species. The bay also supports a relatively large population of waterfowl and water-associated birds, many of which are migratory, and a smaller number that are resident. Many of the invertebrates, from the smallest to the largest species, are important links in the food chain. (See Appendix A.)

Vertebrates, such as fish and birds, are at the top of this chain. Thus, in spite of human activities that have included dumping of trash and waste material in the bay, there has been some re-establishment of the natural environment, and it has great potential for future improvement and enhancement.

No known rare or endangered species of flora or fauna are found in the current state recreation area. The brown pelican, an endangered species, is sometimes seen flying off-shore over the bay.

Fishing and birdwatching provide recreational interest to many visitors now using the area.

Generally, the San Francisco Bay is rather shallow south of San Francisco, and some problems exist for boats with keels and deep drafts. Channels are required to get some boats out into the deeper water.

<u>Cultural</u> Values

The area consists principally of fill materials deposited since 1955. There is a slight chance that maritime cultural materials, such as ship hulks, are buried under the landfill. There is a slight possibility that Native American cultural resources, either disturbed or intact, may remain under the landfill. A marine salvage yard is known to have operated near Candlestick Point circa 1910-1935. Either the bow or stern of one of the salvaged ships (CA-SFR-111H) is known to be overlain by fill in the southwest corner of the unit.

Three Native American shellmounds (Nelson 387, 388, & 389) are known in the area, but it appears that they are all off DPR property. One of these mounds is known to exist under fill in the San Francisco Executive Park, adjacent to the southwest corner of the unit. It is possible that small loci of this or the other two known mounds may exist under fill along the inland edge of Candlestick Point SRA.

Historically, the San Francisco Bay mudflats were used to dispose of the many sailing vessels that had graced the waterways of the west coast during the 19th century. The ships were run into the mudflats, burned to the waterline, and all the metal was salvaged for profit. Candlestick Cove was a major location for ship salvaging.

Declaration of Purpose

The primary purpose of Candlestick Point State Recreation Area is to make available to the people the recreational opportunities, passive and active, that are offered by the shoreline, waters, and environment of the San Francisco Bay and the adjacent bay waters. The lands and resources of the site may be modified or enhanced to achieve optimum realization of the recreational potential.

Declaration of Resource Management Policy

Natural Resource Management

The setting of Candlestick Point State Recreation Area next to the San Francisco Bay provides important opportunities for satisfying the recreation and open space needs of people living or visiting in the San Francisco area. It is the policy of the department to protect the scenic values and to enhance, manage, and protect the biotic and natural resources of the area, while fully realizing the potential of the area for fulfillment of outdoor recreation needs.

A wetland restoration and management plan shall be developed for the area north and east of the extension of Yosemite Avenue to the Bay, an area known as the Nature Area. The plan shall include provisions for natural restoration and removal of debris, design of a shoreline configuration that provides a healthy intertidal action, revegetation, and wildlife habitat enhancement. This plan shall be developed in coordination with local, Bay protection, and wildlife agencies.

Prior to intertidal and subtidal dredging for boat access or other purposes, a resources evaluation shall be made by Department staff, and consultation made with the appropriate local agencies.

Cultural Resource Management

Management of potential cultural resources at Candlestick Point SRA is governed by state statutes and departmental policies and directives. The following portions of the Public Resources Code pertain to management of cultural resources: Chapter 1.7, Section 5097.5; and Chapter 1.75, Section 5097.9.

The following Resource Management Directives pertain to the potential cultural resources of Candlestick Point SRA: 24, 25, 32, 50-52, 58-60, and 69-72.

In addition to the statutes, policies, and directives noted above, the following cultural resource policies pertain specifically to Candlestick Point SRA: The Department will maintain a sensitivity toward any Native American resources identified now or in the future, and will preserve their integrity. Furthermore, in keeping with the Department's flow of history concept, the story of the Ohlone (Costanoan) and other migratory tribes, both before and after Euroamerican contact, should be presented through interpretation.

The remains of at least four hulks are imbedded in the underlying mud near the southwest edge of the unit. Preliminary investigations of one of the hulks revealed the remains of a wooden ship similar to the lumber schooner C.A. Thayer. The Thayer is now in the National Park Service Maritime Museum in San Francisco. These hulks are probably the remains of a marine salvage operation circa 1910 to 1940. The yard operator acquired ships, grounded them in the mud flats, and burned them to the waterline to salvage the metal. The fact that the recorded hulk (CA-SFR-111H) was burned to the waterline helps support this theory. These data are based on a short history commissioned by the San Francisco District.

San Francisco Bay has many areas containing shipwrecks. In addition to marine salvage operations, ships and barges have been abandoned in shallow side bays and on mud flats for more than 100 years. In addition to abandonment, many ships were intentionally dragged into positions where they could form the base for the numerous fill areas which have expanded the land and helped fill in the bay over the years.

It is possible that hulks remain in the bay mud under portions of the Candlestick Point fill. Although the pattern of the use of hulks for fill base had been generally abandoned prior to the filling at Candlestick Point, it is possible that there were already abondoned hulks in the mud when the area was filled. Due to the possibility that the remains of ships having historical value might remain under the filled areas at Candlestick Point SRA, the San Francisco District shall work with Central Coast and Resource Protection Division staff to determine the reliability of remote sensing as a method to identify potential cultural resources. There is some question as to the potential reliability of such techniques as magnatometer testing due to the constituents of the overlying fill. Should it be determined by consensus that one or more of the available remote sensing techniques be reliable, all areas designated for developments which shall entail excavation near to or below the original pre-fill surface shall be tested prior to excavation.

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Should remote sensing prove unreliable, all excavation near or into the original surface shall be monitored by a DPR staff archeologist or designated consulting archeologist. Should significant cultural resources be discovered, by whatever technique, they shall be examined in a manner appropriate to the Public Resources Code and departmental Resource Management Directives.

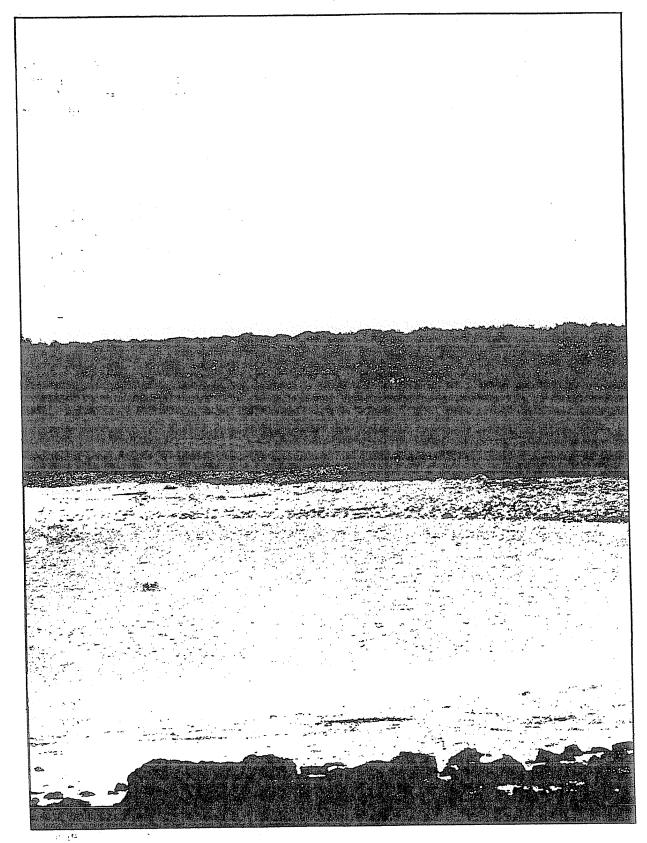
It is known that the remains of three Ohlone (Costanoan) shell mounds and possibly a Chinese Shrimp Camp exist under fill near the inland edge of the unit. Although recent research indicates that these resources are not on state park property, there is still a possibility that significant buried cultural resources underlie the fill along the inland edge of the unit. It shall be policy to monitor all excavations in all areas of the unit nearby or above the original shoreline. Determination of original shoreline shall be by analysis of maps and aerial photographs prior to excavation. All such excavation shall be monitored by a department staff archeologist or designated consulting archeologist. Should in situ cultural resources be discovered, they shall be examined in a manner consistent with the Public Resources Code and appropriate departmental Resource Management Directives.

Recreational Resource Management

When determining what recreational activities should be provided at this unit, the primary concern should be to meet the needs of the people (primarily urban dwellers) in conformity with maintaining a desirable physical setting on the bayshore.

All departmental activities in Candlestick Point State Recreation Area will be carried out in conformance with the Resource Management Directives of the department.

LAND USE ELEMENT



LAND USE ELEMENT

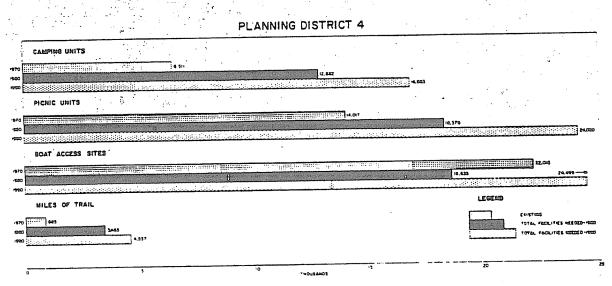
Recreation Demand

Candlestick Point State Recreation Area is located on the San Francisco Bay, within 1-1/2 hours travel time for most bay area residents. The recreation area is located in Planning District 4, which is comprised of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, Santa Clara, Solano, and Sonoma Counties. These counties contain 22.62% of the state's population.

Currently, there are more than 1,200 public and private recreation areas in the bay area; these include more than 450,000 acres.

This area has the largest per capita demand (current and projected) for outdoor recreational facilities of any in the state. Demand is greatest within a driving time of less than one hour. In determining demand in California, the state's Park and Recreation Information System (PARIS) was used. The PARIS study indicates a great need for more public recreation facilities (see graph below). The General Plan for Candlestick Point State Recreation Area is aimed at helping to fulfill these needs.

Figure 1
Study of Recreational Facilities in Planning District 4



Public Transportation

According to federal officials, 50 percent of the bay area's 4.4 million urban residents are unable to reach the 470,000 acres of public park land around the San Francisco Bay, due to the inadequacies of public transit.

Because of this problem, it is of primary importance to recognize and address the public transportation situation. Local systems available to bay area residents include: Golden Gate Transit, the San Francisco Municipal Railway (MUNI), San Mateo County Transit (SAMTRANS), Alameda/Contra Costa Transit (A/C Transit), the Bay Area Rapid Transit System (BART), and the Southern Pacific Railway.

Because Candlestick Point State Recreation Area is in the city and county of San Francisco, the only direct transit system to the unit will be the San Francisco Municipal Railway. All other systems will enter the city and county of San Francisco; passengers must transfer to a municipal railway line to reach the recreation area.

During the planning process, the San Francisco Municipal Railway was consulted for its assistance in developing future bus lines to the recreation area.

Municipal Railway planners supported the concept of recreation transit routes. Their experience with a summer recreational transit project to the Golden Gate National Recreation Area was very successful. Many bay area residents used the bus to visit various lands in San Francisco and Marin Counties. However, due to insufficient funds, the program was terminated.

The railway planners also made Department of Parks and Recreation planners aware of the present bus lines to the nearby Bayview community, and that there are currently no San Francisco Municipal Railway routes directly to Candlestick Point State Recreation Area.

This plan proposes at least two public bus stops. The actual locations of the stops will be determined in the future, with the assistance of the San Francisco Municipal Railway.

This analysis indicates the need to coordinate a transportation network, using existing local transportation systems, that will bring people by public transit to visit this and other state lands in and near urban centers. This will involve further studies, funding, and programming.

Vehicle Circulation and Parking

Highway 101 and major city streets are near the SRA. Traffic during the weekdays is light, consisting mostly of industrial trucks traveling from Highway 101 to the India Basin Industrial Park and the stadium. On Candlestick Stadium ballgame weekends and weekdays, traffic is congested on Highway 101 and along Harney Way, Jamestown Avenue, the Hunter's Point Expressway, Gilman Street, and Carroll Avenue. This circulation problem will not be mitigated by development of the state recreation area.

The recreation area's vehicular circulation will be via the city streets directly into state parking lots. Access points for the recreation area are:

- 1. Off Harney Way, directly into the Last Port Picnic Area parking lot.
- 2. Off the Hunter's Point Expressway, into the peninsula area and Cultural Center area parking lots.
- 3. Off Carroll Avenue and Fitch Street, into the boat access facility area parking lot.

The plan proposes a realignment of Carroll Avenue and Fitch Street. This change would help circulation from Gilman to Carroll, and would provide better use of the current isolated parcel of state land west of Fitch Street. It would also provide the recreation area with a wider parcel of land to use, and would complement the proposed boat launching facility area.

Parking is another issue of concern at Candlestick Point. Currently, Candlestick Stadium's ballgame fans park in the stadium lot and on surrounding vacant lots used for overflow parking. Some of these vacant lands will be absorbed by the recreation area. This plan does not propose to retain the vacant land as overflow parking lot areas. Parking for the recreation area will be predominantly peripheral, allowing the interior of the recreation area to be free from vehicular intrusion. This plan allows for 625 parking spaces to fulfill the projected attendance of 2,500 persons on an average recreational day. Fees will be collected for parking. Large events in the SRA will be scheduled so they do not conflict with stadium traffic.

The city and county of San Francisco have submitted a proposal suggesting realignment of the state recreation area boundaries, somewhere between Carroll Avenue and Gilman Avenue. Some people feel that this will increase overflow parking lot lands, which they need on heavy ballgame days. The exact locations and details of the city's proposal will need further investigation, discussion, and public review before any decisions are made.

Estimated figures and analysis of the overflow parking situation are provided in the Environmental Impact Report, page 48.

Existing Land Use

50 acres of lands along the southern shoreline, including the southern quiet point area, are open for public use. Landscape planting now provides the hills, valleys and grassy spaces of a park setting, with picnic facilities, two fishing piers, shoreline protection, trails, restrooms, and parking.

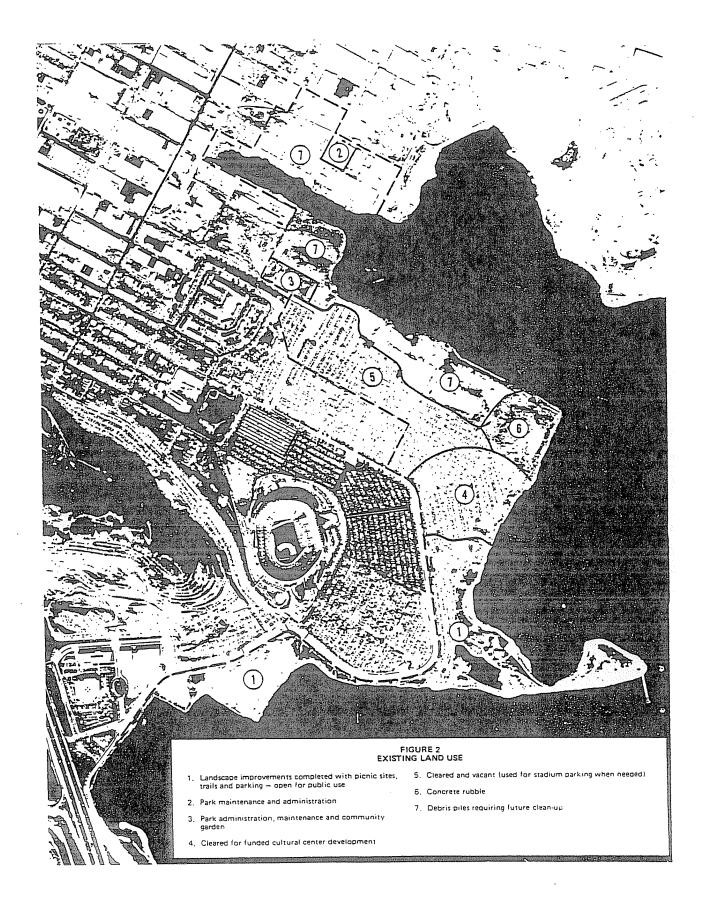
3 acres are now used for the maintenance yard, administration facilities, and a community garden.

20 acres are cleared, and are now in the process of development. Improvements for this area will include landscape beautification and cultural center facilities.

27 acres are cleared of rubble and debris piles, but remain vacant, with no landscape beautification or facilities. These areas are used for overflow stadium parking on very busy game days.

One area of about 10 acres contains piles of concrete rubble. This area is being used by artists for various temporary creations expressing an appreciation of the city's building remains in contrast to the stark, open space of the bayshore. Their works create access to scenic vistas, interpret recent human history, and provide an awareness of historical activities on the site.

The remaining 45 acres contains piles of debris, and requires future clean up to make it accessible for public use.



Proposed Land Use

The details of design for future facility developments cannot be formulated at this general and conceptual planning stage. However, it is important to convey the general concept which should apply in the future to the detailed design of facilities.

The design criteria for Candlestick Point improvement should create an environment which supports the physical, social, psychological, economic, and esthetic needs of humanity. To satisfy such design criteria will require a sensitive appreciation of nature, humanity, and the city, as interrelated positive elements. Humanity, nature, and the city are compatible elements of well-designed spaces.

The Cultural Center area would be the most formal, almost city-like design. Fanning out from this area would be various degrees of open space. Marshlands and mudflats would be located in the northeast section. Organized picnicking and informal sports-type recreation will occur in the existing mounded, open grassy areas. Exploration, adventure, and discovery will occur in areas which are not so predictable. Irregularity should be planned into the landscape so some of the adventure and discovery experienced in other state parks can take place at Candlestick.

In these spaces, people can experience their needs and sensitivities for air, light, space, water, food, and shelter, as well as social-psychological experiences in security, privacy, interaction, and variety. By being sensitive to human needs, the design is able to incorporate these needs into compatible activities and spaces. It is important to keep these design criteria in mind while reviewing the developments proposed in this plan.

Construction of the recreation area at this site requires design techniques compatible with the land form. The planners and designers recognize this opportunity to include appropriate design and technology.

For further understanding of the bay landfill, refer to the mapping of bay mud properties, plot plans of the artificial fill, bay mud limits, structural site considerations, and the regional geologic survey (Appendix B).

Lands caping .

Landscaping is without a doubt the single most important element in the development of this recreation area. By the time the project is completed, trees, shrubs, flowers, ground cover, and lawns will cover more than 80 percent of the land in the unit.

At the public workshops, the people strongly voiced their desire to have California native plant materials used exclusively within the recreation area, with the possible exception of the lawns. Insofar as possible, that mandate will be followed.

The sensitivity with which the landscaping is designed and installed is of paramount importance to the visitor experience, as well as to the success of the overall interpretive program.

Windscreening

The potentially adverse seasonal winds must be considered in all aspects of the design. Hills, mounds, or tree groupings will protect all intensive use areas from summer winds.

Individual wind screens, similar to those at San Buenaventura State Beach, will be constructed in the family picnic areas.

An interesting observation was made by the planners on an initial visit to the project site. The existing fishing pier on the North Shore had had scrap boards nailed onto the guardrails on the windward (west) side. Noting that this had obviously been done by fishermen as a wind protection measure, it was decided that all proposed fishing piers should be similarly protected.

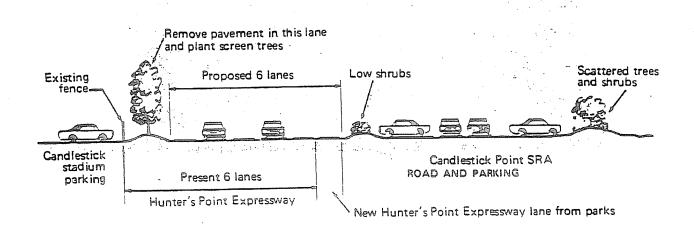
Public input, as well as observations made by the planners, indicates clearly that a dense row of tall trees along the west boundary will afford substantial wind protection to the main body of the recreation area. These trees will also serve the dual purpose of closing off the recreation area from the negative visual impact of the stadium parking lot.

'Initially, it was thought to put these trees along the recreation area boundary, on the east side of the Hunter's Point Expressway. However, it seems feasible that the trees could be situated on the west side of the Hunter's Point Expressway, thereby affording passers-by a pleasant view of the recreation area and the bay.

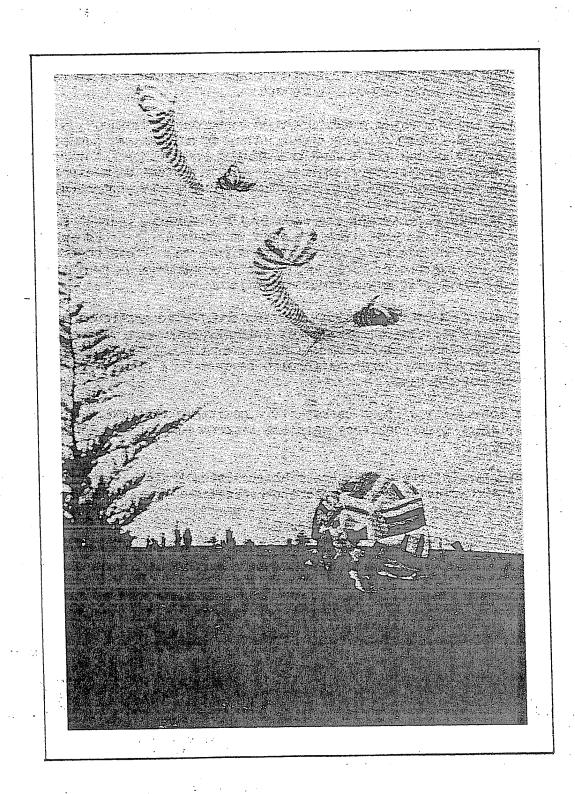
To facilitate this, it will be necessary to negotiate with the city of San Francisco to plant the screen trees near the western lane of the Hunter's Point Expressway.

Scattered clusters of trees and shrubs planted inside the new recreation area boundary would then provide vistas into the recreation area and the bay beyond.

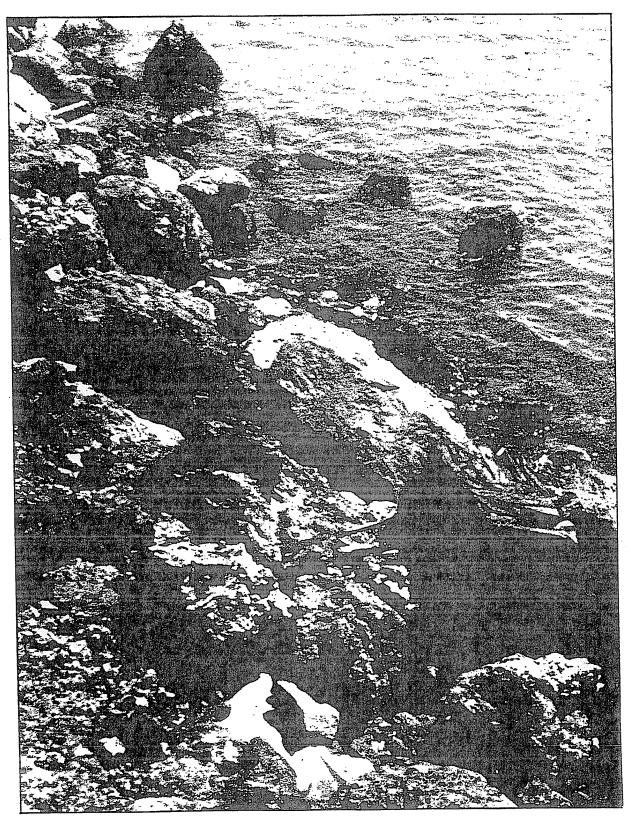
Figure 3 Windscreening Main Recreational Area



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FACILITIES ELEMENT



SAN FRANCISCO BAY REGION

INTERNAL MEMO

File No. 2178.05(DDD)DR

TO:	DIA	TE MAYARRO, DEPT, OF WATER	FROM:	DONALD D. DALKE, SECTION LEADER			
	3830	OURCES, RESOURCE EVALUATION INTER	-	SAIN MATEO COUNTY	-		
DATI	E:	AUGUST 4, 1079	SIGNATI	IRE: Donald Double			
SUBJ	ECT:			OFFENT PLAN, AND ENVIRONMENTAL STATE RECREATION AREA PROJECT			
		ollowing comments are offered regard project:	arding the	Environmental Impact Report for	_		
	1.	The impact of discharge of untrea San Francisco Bay during the wet		ge into the South Basin Channel of period should be considered.			
	2.	Irrigation practices should be defined. If reclaimed wastewater is considered for irrigation, use areas should be well defined, as well as necessary degree of treatment of wastewater; and the sources of such wastewater.					
	3.	Inactive Disposal Site					
		The inactive waste disposal sites Minimum Criteria for Proper Closu Sites, Resolution No. 77-7 (attac	ure of Cla		-/		
		a have any questions with regard (8) 561-0682.	to this, p	please call Anders Lundgren at -			

Attachment:

Resolution No. 77-7

cc: SWRCE

Division of Planning & Research Environmental Analysis Unit

Trails

A network of trails will loop throughout the state recreation area to expose visitors to diverse experiences. Public accessibility to the San Francisco Bay shoreline is needed. The trails include hiking, biking, jogging, wheelchair, and emergency vehicle service access throughout the area.

The hiking and biking trails will be separated. At times, they will parallel each other; at other times, they will take separate directions and have separate destinations. All trails will be routed through trailheads, major activity centers, and areas of the shoreline.

The trail system recognizes the need to stretch beyond the recreation area boundaries, and to tie into surrounding trails. There are existing city streets designated as bike routes at the northern part of the recreation area along Ingalls Street which will be complemented by the state bike routes. At the southern end of Candlestick Point State Recreation Area, the proposal in San Mateo County called Fisherman's Park will create biking and hiking trails to provide San Mateo County residents with accessibility to shoreline fishing along Highway 101. Candlestick Point's biking and hiking trail system will easily interconnect with the proposed Fisherman's Park, creating further public accessibility and recreation on the San Francisco shoreline.

The specific designs of the trails (paving surface, grades, and locations) will be determined as the site area plans are budgeted and developed.

<u>Hiking Trail</u>

The hiking and walking trail system meanders throughout the recreation area. There will be a special major hiking trail at the Nature Education Center. A nature trail would cause the least amount of damage or disruption to rehabilitation efforts of the natural area, as well as providing public access and awareness of the natural resources. The Nature Education Center will be the control point for the start of this nature trail.

Jogging Trail

Joggers and runners will be provided with a separate trail on the fringe of the open grassy area, as well as an exercise course. Otherwise, they will share the hiking trail, because the two forms of recreation are compatible.

Bicycle Trail

The bike trails will converge at strategic areas. People will be able to rent bikes and pick up interpretive material. The bike trail ends at the Nature Education Center. There will be bike racks and locks in several locations so people can leave their bikes and become involved in various other activities.

Group Picnic Areas

Group picnic areas in the SRA can be located in all developed areas. They will include a group cook shelter, picnic tables, a gathering area with a fire ring, comfort stations, and an open area for informal play. These facilities will accommodate up to 100 people, and will be available to the public by reservation.

At least one group picnic area will be designed specifically for use by the physically disabled. This area will be located near the Cultural Program Center, the swimming beach, and parking, and will be connected to these facilities by paved walks. The picnic area will be paved for ease of use by people in wheelchairs. It will contain tables, stoves, and restrooms designed for use by the disabled.

Figure 5
Group Picnic Area for Physically Disabled

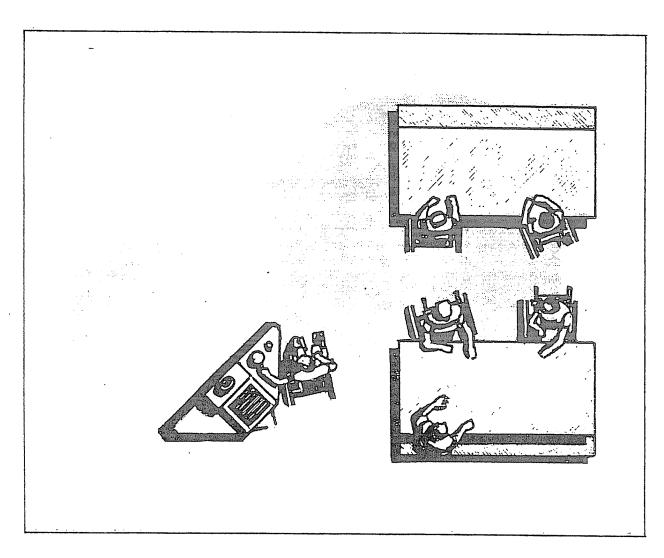
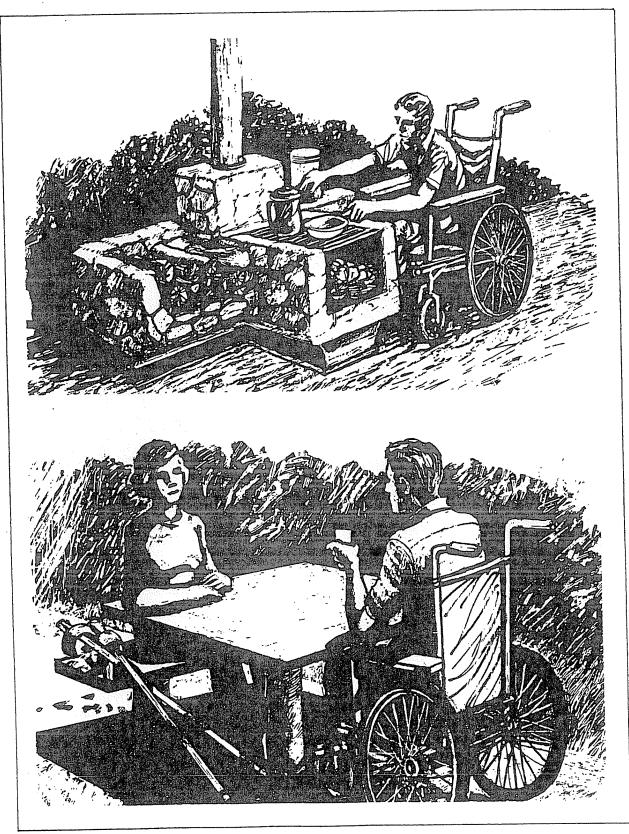


Figure 6 Group Areas for Physically Disabled



Family Picnicking

Family picnicking was the number one item requested by the people at the public meetings and workshops. In keeping with this request, picnicking will be provided at various locations throughout the recreation area. Tables and stoves will be provided among the trees, with windscreens situated to afford maximum enjoyment and use of the area on windy summer afternoons. Interpretive panels will be located near the larger concentration of picnic tables.

Group Campgrounds

Overnight camping was a vital concern at almost every public meeting and workshop. Two distinctly different needs were expressed: the need for overnight tent or recreational vehicle facilities, and the need for facilities for groups. It was felt that such groups need a place near the city where they can enjoy overnight camping.

At the alternative plan workshops in January 1978, the public opted to eliminate individual camping facilities from the plan, and to retain two group camps, with the suggestion that, if the staff found it feasible, it could permit RV camping in selected day-use parking areas on a one-night-only basis.

Each group camp will contain a group cook shelter, picnic tables for 25 people, a campfire circle, interpretive panels, and approximately 10,000 square feet of tent space. One combination comfort station-shower building, centrally located, will serve both campgrounds. A fishing pier, a fish cleaning station, and a small boat dock will be provided for the two campgrounds.

Campers will park in the day-use parking lot, and a service road will be provided for delivering supplies and equipment and for maintenance of the area.

These campgrounds will help to foster community participation in the SRA; they will be available to the public by reservation only.

Fishing Piers

Another popular request at the public workshops was for several fishing piers. This plan provides for four piers, two of which now exist; new pier locations should consider good fishing sites, as indicated by local fishermen, as well as closeness to popular use areas. The design of the piers will be dealt with during development planning, and will require consultation with wildlife conservation and boating experts. Outdoor lighting for night fishing and fireproofed piers are recommended.

Rock reefs will be created on the bay bottom near the piers to improve the local fishing habitat. Fish cleaning stations will be provided on or near each of the piers.

Non-powered Boat Rental

Many people who attended the department's public meetings and workshops felt that powerboats should not be permitted at Candlestick Point SRA. Water, air, and noise pollution were the primary objections.

The underlying feeling of most of the public's desires for this unit is "naturalness" -- a place where they can get away from the noise and hustle of the city, and can enjoy the San Francisco Bay.

The San Francisco Department of Public Health lists this part of the bay as "of recreation quality," and predicts that bay water quality will improve in years to come.

This plan calls for restricting concentrations of powerboats from the cove area of the Candlestick shoreline. This will be accomplished by placing buoy markers between the Cultural Center shoreline and the quiet area point.

The non-powered boat/wind surfing rental facility could be located in Candlestick Cove to meet the public's desire for quiet enjoyment of the bay in this area. The facility could include a boat rental stand, docks, food and beverages, and a bait and tackle shop.

Wind Surfing Facilities

Wind surfing has become increasingly popular in the 1980s. The cove area is ideal for beginners to learn wind surfing skills. Advanced wind surfers find the open bay off the Candlestick Point SRA southern shoreline an ideal and challenging wind surfing area.

Staff shall work closely with wind surfer user groups to develop appropriate facilities compatible with other park users, and significant improvements shall be provided for a safer parking access and shoreline for wind surfing activities.

Boating Center

This plan recommends a boating center where a variety of activities related to boating may take place, including classes in seamanship, safety, and construction of a variety of non-powered small boats, such as Hawaiian, Samoan, etc.

Community schools, universities, and boating oriented organizations would help develop educational programs using the boating center.

Sand Beach

Many people who participated in the public involvement process remember Candlestick Point's shoreline area as once being a swimming beach, before the landfills. They would like to see a return of this beach experience. To fulfill this need, a sand beach is proposed in the cove area of the SRA.

People will be able to stroll, sun, and play on the beach. Swimming in the bay will be permitted on days when the bay water is up to health standards and codes. Although the water quality of the San Francisco Bay has improved greatly since creation of the Bay Conservation and Development Commission (BCDC), there is still some question as to the site's specific water quality conditions for Candlestick Point. Therefore, the San Francisco Bay water will need to be continually tested by the department on a daily basis as to the water's quality and acceptability for body water contact and recreational usage.

<u>Quiet Area</u>

The southeastern point in the unit is an area of special peace and tranquility. Once there, visitors are surrounded by the San Francisco Bay waters and distant views of the shipyard and Alameda County. The sounds and visual impact of Highway 101, industries, and residences diminish; only the sounds of bay tidal action and occasional aircraft remain. This unique feature must be seen to be appreciated. The plan recommends retaining this area with its sense of meditation, enhanced by landscaping, mounding, wind screen planting, and grass. To facilitate public access, both hiking and biking trails will loop around the area. Benches, wind-rain shelters, a few scattered picnic tables, and a comfort station will be located to aid in the public's enjoyment and appreciation of this area.

Cultural Program Center

The Cultural Program Center should encompass recognition of human beings as a valuable resource. The theme of the center is emphasis on the positive values, conflicts, and experiences that are shared and built by people to improve their lives. The center is an area where many activities and facilities can contribute to public enjoyment of the landscape. People will gather to generate programs, and to build understanding and pride in themselves and the state recreation area, as well as to visit and participate in the fun.

A variety of activities can happen at the Cultural Program Center, allowing for recreation visitors to be introduced to different experiences.

People at the public involvement workshops encouraged a docent program of volunteers to work with the rangers in publicizing and programming the state recreation area. This kind of involvement, support, and willing cooperation by people is mandatory to achieve success of the Cultural Program Center.

So the docents and staff can efficiently work together on a continual basis, a compatible indoor program work space will be provided in the center. The building will include the park administration offices, a docent-community work space, meeting rooms, an information counter, interpretive displays, a first-aid station, restrooms, a lounge, and storage and materials space.

An indoor/outdoor design of the structure will add to the flexibility and dimensions of the programs. Consider senior citizens—a valuable resource, but often neglected. They need creative and varied programs, including indoor and outdoor recreation spaces that are close. The plan encourages the involvement of senior citizens in sharing their skills, knowledge, and wisdom in developing programs.

The proposed theater is a structure that will accommodate a wide variety of events. Seating and a stage platform will be provided. Programs for the theater's use are flexible, and are based on the initiative and cooperation of the staff and the general public. Suggested programs include dance, music, and theater.

Outside the structure is an outdoor space which can be used for many purposes, and is flexible. The concept is to have this outdoor space be the central area from which visitors can view the bay, the grassy knolls, the energy demonstrations, the trail systems, concessions, children's play areas, and picnic areas. This panoramic viewing enhances the recreational choices of visitors.

The outdoor space could include seating areas, landscaping, sun and wind screens, and enough space to encourage arts and crafts demonstrations, displays, vendors, social gatherings, and events.

The energy program demonstrates that energy is in and around all of us. At Candlestick Point State Recreation Area, there is an abundance of energy-solar, wind, water, land, and human energy. These energy forces can be tapped to demonstrate the conservation and recycling processes, and the uses of natural resources and human potentials in free, non-polluting, safe, and enjoyable ways.

For example, solar demonstration includes solar reflectors, ovens, water heaters, and sun dials. The use of the wind can be shown by windmills, wind generators, ballooning, sail wheel wagons, kites, and music through wind harps, chimes, and bells. Water recycling can be graphically displayed. A water model could demonstrate hydroelectric generation. The land capability can be best demonstrated by the community gardens, which can produce a vegetable harvest, and can show the recycling process of composting. People can be shown their own capabilities as these projects are built and operated. All of these energy demonstrations are important and significant to Candlestick Point State Recreation Area, since the unit itself involves recycling of land and shoreline, and re-establishment of marsh and mudflats.

The children's play area will be environmental exploration, both natural and cultural, on a child's scale. The concept is to offer children an environment with elements of adventure, surprise, intrigue, and challenge. In concept, the experiences would be relative to climbing boulders, crossing a narrow suspension bridge, or crawling through a cave-like dark passageway around a bend into a large lit area. By exposing children to a variety of environments and challenges, the children's play area can be both fun and interpretive. To complement the environmental and cultural exploratorium, some of the current standard and versatile play equipment can be sensitively incorporated into the design, to allow for blending the new and old forms of recreation.

More childrens' play areas could be located at other locations. They would be much smaller, and would be there primarily for the use of family picnickers.

A full kitchen for the sale of food and beverages may become a major concession in this Cultural Program Center area. Often, the convenience of a full kitchen helps people to enjoy their cultural experiences during their recreation day.

The rent-a-bike system is another recreation opportunity and concession. There are two proposed locations for this system: one at the center, and the other at the Last Port Picnic Area. Visitors on the trail system can travel to the nature area, where bike racks will be available for the rent-a-bike system.

The potentials for the Cultural Program Center are vast, and are barely tapped in this document. The creative minds of the ranger staff and docents will stimulate more public involvement participation in programming and development of the center.

Boat Access Facility

All previous plans for this area have included marinas, and, at first glance, it seems natural that Candlestick Point SRA should include, if not feature, a marina. In fact, this was one of the first items proposed by San Francisco boat owners at the public workshops.

As planning progressed, state planners studied in depth the status of marinas in the San Francisco Bay. They found that all existing marinas have long waiting lists for berths. They also discovered that there are several large marinas proposed for construction in the future.

There seem to be two answers to this concern. One is that the demand will not be met, no matter how many marinas are built; the other is that the statistics are misleading, because many people sign up for berths at more than one marina, and because the proposed marinas, when built, will more than meet the projected needs.

The plan proposes a boat access facility that would allow bay area boaters to visit and enjoy the SRA, and that could help alleviate traffic problems on Candlestick Stadium game days by encouraging people to attend games by ferryboat, rather than by car.

This plan includes a four-lane boat launching ramp, 200 car-boat trailer parking spaces, and a concession-operated boat service station. A protective breakwater is proposed in conjunction with the boat launch facility, with docking for ferryboats and transient boats.

Dredging will be necessary for any boating channels or launching ramps. Studies will be needed for construction, to determine the environmental and economic impacts of dredging. As a result of these studies, the exact location of the boat access facility may vary 1,000 to 1,500 feet from that shown on the graphic Land Use and Facilities Plan.

Ferry Landing

Public interest in traveling from various waterfront recreation areas resulted in a proposal for a ferry landing at Candlestick Point State Recreation Area. People saw ferry travel as a leisure form of recreation. Conceptually, the ferry landing would concentrate on providing another dimension and exposure of the San Francisco Bay to recreation area visitors. The ferry could potentially stop at waterfront recreation areas in the counties of San Francisco, Marin, Contra Costa, Alameda, Santa Clara, and San Mateo.

The ferry landing would include a floating dock, a turning basin canal, a snackbar, a staging area, and a comfort station. A concessionaire could contract to operate the ferry landing facilities.

There are now no passenger ferries routed through the south bay. In the north bay, there is the Golden Gate Transit, traveling between Marin and San Francisco. The Harbor Bay Tours, Incorporated, and the Bay Cruise Red and White Fleets, which provide ferry passenger service out of San Francisco, are also traveling in the San Francisco Bay. A network of south bay terminals and systems has been studied and discussed, but development costs are prohibitive. At this time, there is no indication of a totally interconnected bay ferry system to the south, north, east, or west shorelines.

Since this is a general plan with long-range goals, it is essential to look at this proposal in the light of future planning. As a positive future goal, a ferry landing could provide an important recreational experience not now available in the south San Francisco Bay.

Last Port Picnic Area

A dinner restaurant, a family picnic rest stop, and a parking area would be located in this area.

The restaurant is discussed in the Concession Analysis.

The family picnic rest stop will include clustered picnic tables and stoves, a children's play area, a rent-a-bike system kiosk, a bird observation overlook, and comfort stations.

Exercise courses for walkers and joggers may run through the Last Port Picnic Area. They could include panels to explain the exercise routine, with some running/walking distance between panels. The course could be a complete loop with an offshoot passing the children's play area, and connections to the other trails.

Open Grassy Area

On either side of the Cultural Program Center are two large spaces of open, grassy area. One area, to the north, will be like a wide-open grass valley, with trees on the edge. This area is compatible with activities such as kite flying, noncompetitive games (new games), and informal ball games. A jogging/walking course could run among the trees and in the grassy area.

To the south of the Cultural Program Center is a second large grassy area, bounded by the sandy beach and the bay waters. Along the barren shoreline is the reestablishment of a marsh habitat. The habitat supports a natural coastline in this area. It is an excellent area for strolling, shoreline fishing, and general relaxation.

In both large, open grassy areas, there will be scattered picnicking, comfort stations, hiking and biking trails, landscaping, and windscreening.

Service Area

A maintenance yard and service area will be located near the intersection of Carroll and Griffith Avenues. This site includes vehicle and boat storage buildings, and other facilities necessary for maintenance of the recreation area.

Further Investigations

There should be continuing analysis of specific site conditions at Candlestick Point State Recreation Area. A more detailed analysis can change the proposed facility development. Recommendations for further investigations or studies include:

- 1. Test borings of the land fill.
- 2. Site soils analysis.
- 3. Wind site-specific data.
- 4. Water quality site-specific data.
- 5. Shoreline water depth surveys.
- 6. Monitoring sediments of fill.
- 7. Understanding of the tidal currents in the cove area, to insure retention of the proposed sand beach.
- 8. Siltation rates of dredged channels.

Concessions

Local citizens in public workshops recommended that concession facilities be installed to help visitors enjoy the SRA, and to provide jobs in the area. The services most frequently recommended were a boat marina with associated facilities, and restaurants. Other concession/services recommended included food shops, bait and tackle shops, and boat and bicycle rentals.

This analysis deals with concessions mentioned at the public workshops.

In preparing the analysis, the interest of state officials and local citizens in creating jobs and investment opportunities has been kept in mind.

Marina

A marina for recreation boats would include a boat storage yard, a storage locker, equipment for marina fuel sales, a shop chandlery, and facilities for boat repairs.

There is an immediate need in the bay area for berthing space for recreation boats, and for associated marina facilities. However, it is not economically feasible for an investor to build a marina at this site, because of dredging costs for access to deep water.

Silting sometimes will refill a dredged channel. In some areas of the San Francisco Bay, there is no evidence of siltation; at other marinas, dredging and redredging is a real problem. The question of silting can be resolved only by a study.

A breakwater would also be necessary to protect boats and the marina from storms. The cost of a breakwater would be prohibitive for a concessionaire.

A marina at Candlestick Point would need protection from the strong, cold winds that blow from spring to fall each year. Discussions with four harbormasters and three other persons with many years of experience in San Francisco Bay waters failed to result in a solution to this wind problem. The winds would be a special problem for sailboaters, who may have difficulty navigating in a dredged channel; sailboaters constitute about half of all bay area boaters.

If the state provided funding for dredging and a breakwater, and for maintenance dredging if necessary in future years, a marina development by a concessionaire would be economically feasible. The concession contract would have to be for a term of approximately 20 years.

This General Plan does not recommend a marina concession because of the costs of dredging and breakwaters that would have to be provided.

The following concessions would be an asset to the park and are recommended by this plan:

Ferry service to/from pier
Transient boat docking and possible boating safety center and
gasoline service
Bait and tackle shop
Cultural Program Center
Small food service concession in Cultural Center
First-class restaurant
Bicycle rentals

After a marsh has been successfully restored, a gift shop at the Nature Education Center would be appropriate.

There is a windsurfing concession operating at the park for a one-year term. A longer-term contract may be considered at the end of its term.

Long-Range Planning Recommendations for Future Additions

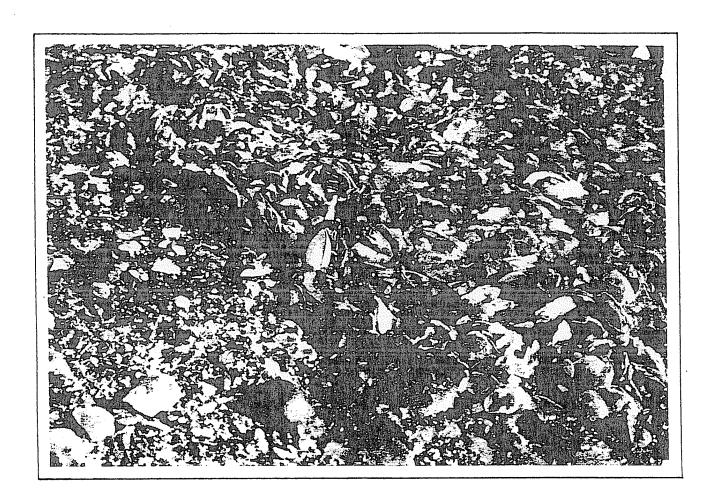
The lands between Griffith Street and the railroad tracks, from Yosemite Avenue to Carroll Avenue, should be investigated for possible future acquisition. Because there is now only 6 to 10 feet of state property at the South Basin Canal, any additional width of land would be of primary importance for public access through the unit lands and as a buffer for the nature area. The land could be used as part of the nature area; the land location and the lack of wind would make it a prime spot for demonstrating ecosystems of California, and for expansion of the community gardens.

The lands located between Gilman Avenue and the park boundary, and between Fitch and Donahue Streets, should also be considered. Most of this land is used for stadium parking now, but the land is zoned "industrial" and, in the future, industrial development on this land could become a very negative impact on the open space recreation area.

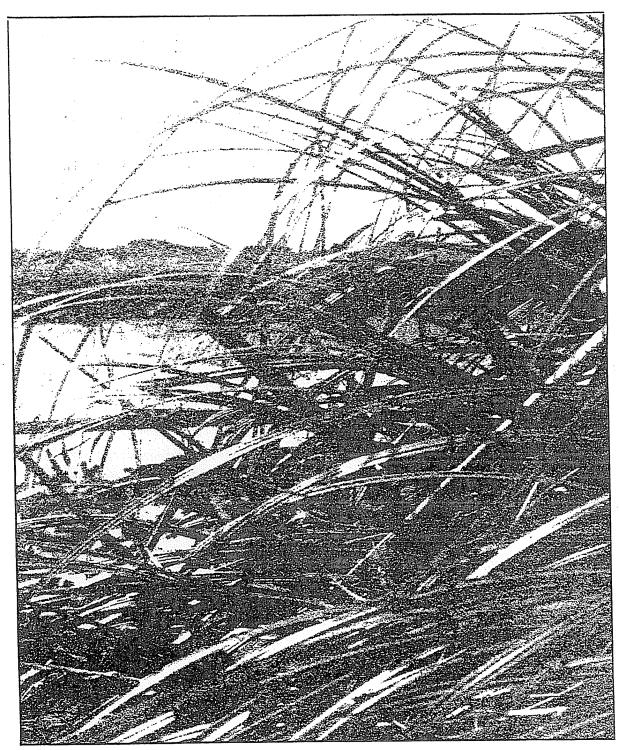
The bayshore lands at the north end of the park are owned by the U.S. Navy. These lands include the corner of shoreline where Yosemite Slough enters the South Basin; about 1,320 lineal feet of shoreline.

Expansion of the marsh restoration area would be the primary use of this land, thus expanding the educational and interpretive potentials of the Nature Education Center.

Department staff will work closely with local authorities to improve transportation access to the area by new roads, ferry boats, etc., and to provide year-round access to the park for all recreational users, including during the footbal and baseball season.



OPERATIONS ELEMENT



OPERATIONS ELEMENT

Public Involvement

Continued public involvement is essential to building and maintaining Candlestick Point State Recreation Area. The SRA needs the public to build pride and to maintain itself as an innovative and creative interface between man, nature, and the city.

Public involvement began as a planning process tool, and has grown and developed into trust, pride, and enthusiasm between bay area people and the Department of Parks and Recreation. This relationship must continue throughout the building and operation of the state recreation area. Operations is an all-encompassing term, including public involvement in the programming, interpretation, facilities (especially the Cultural Program Center, community gardens, and Nature Education Center), concessions, and security of the recreation area.

Programming

A program is a plan that determines how facilities will be built and used, and who will build them, take care of them, and use them. Implementation of a plan, construction of facilities, and maintenance, operation, and use of the facilities constructed are programs.

During the public participation workshops for Candlestick Point State Recreation Area, there was constant and repeated comment supporting future community programs at the recreation area. The degree of interest in this program area was far in excess of the interest shown in what was provided, or where. Generally, everyone was in favor of a park with grass, trees, and water-oriented facilities—but how those things get to be there, cared for, and used is of the utmost importance.

This need for programs originating within bay area communities to build, maintain, and operate Candlestick Point is recognized and considered to be part of this plan.

Interpretation

The area has great interpretive potential for programs dealing with urban populations. Ethnic dance, music, and art; human habitation in the area; the Naval history of the site; the Indians' use of baylands; and Chinese shrimp fishing in the bay all increase the potential for public appreciation of this interesting and exciting cultural environment.

Another important element for interpretation is the fact that the park is almost entirely built on artificial bay fill. This provides an opportunity for interpretation of the affects of bay fill and the various materials that make up the fill.

Interpretation of natural features is equally exciting, and includes energy, especially wind and water; bird life and fish life; marshland ecosystems and the restoration of marshland habitats; and the upland habitats where birds and mammals reside.

It is the policy of the department to develop and conduct interpretive programs at this recreation area which will contribute to visitors' understanding of, and responsibilities to, the environment of the San Francisco Bay region, as it existed during its occupation by Native Americans, and as it exists today.

Interpretation at Candlestick Point State Recreation Area should accommodate the varying needs and interests of urban dwellers. It should further introduce visitors to new and unsuspected recreational and educational opportunities.

The development of two primary themes centers around two valuable resources at Candlestick Point State Recreation Area. One is adaptation of the ecological system to intrusion by people; the other is the untapped human resources in the city.

Adaptation of an ecological system to intrusion by people is a unique feature of Candlestick Point. Interpretation would emphasize the drastic changes in the ecological system. The story of the land fill must be told to its best advantage.

Parallels can be drawn between the adaptation of people in a changing environment, i.e., from rural to city dwellers, and the change in the overall ecology of the area as it adapted from the land fill to state recreation area.

A subtheme would be interpretation of the mudflats and marsh lands. This could include a discussion of these ecological adaptations, how they formed, how they change through time, the animals and plants which inhabit them, and the animals and birds that rest here during their annual migrations.

Another subtheme will be interpretation of the State Park System itself--what it means to urban dwellers, what it has to offer them, why it is important to them, how they may enjoy it, where they can find its units near them, and how they can get there.

Development of another primary theme, which centers around the diverse populations of the urban area surrounding Candlestick Point, is also necessary. This theme would incorporate the concepts of human dynamics, self-discovery, and self-improvement.

Little is known about urban interpretation. It is therefore imperative that flexibility be the keynote for any planning of such interpretation at Candlestick Point State Recreation Area. An entirely new system of interpretation, programming, activities, and facilities includes creative ideas concerning non-renewable resources, energy systems, human potential, leisure time, self-enlightenment, awareness, and a sensitivity to the surrounding lands. These are all potential subthemes of urban interpretation at Candlestick Point.

Security

The best form of security is generated by people themselves. The more people mingling and moving through a space, the less likely the chance of problems. This is another example of the necessity and importance of including paid and voluntary (docent) community public involvement in the programming, building, maintaining, and concessions of the state recreation area. This plan proposes

a total commitment of the Department of Parks and Recreation to continue involvement of the surrounding communities. Community involvement will develop citizens' pride and sense of ownership to protect and maintain the state recreation area.

Other dimensions of security are the physical barriers, contact stations, and fencing, which the SRA staff will need to control the unit. Security considerations should be an integral part of the design process in all phases of development. Facilities, landscaping, and altered land forms must not create hazards or severely hamper patrol and emergency access capabilities. Local law enforcement specialists should be consulted as part of the review process.

All vehicle traffic into the recreation area should enter and exit past rangers at the contact stations. The two contact stations will act as control points for the recreation area.

There will be night lighting along the parking lots and roadways. Lighting will also be necessary at the Cultural Program Center and the boat launching ramp. Other lighting will be provided elsewhere in the area, and at the fishing piers.

From past experience, the stadium people have had to deal with anxious ballgame fans who will drive through most standard barriers. The fans move the barriers to park their cars, and then go off to see the games. Therefore, the need for sophisticated design barriers will be needed along the entire recreation area where it parallels the Hunter's Point Expressway and Harney Way.

The plan will provide fencing around the entire natural area to prevent domestic animals, vandals, motorcycles, and other intrusions from disturbing rehabilitation of this area. This fence will travel from Shafter Avenue to the contact station at Carroll Avenue. The U.S. Navy has requested a double fence between its property and the state recreation area. The double fence is agreeable to the General Plan. The rest of the SRA boundary will have some fencing, but it will be minimal because this is a day-use area, and encouragement of walk-in use of the unit is important.

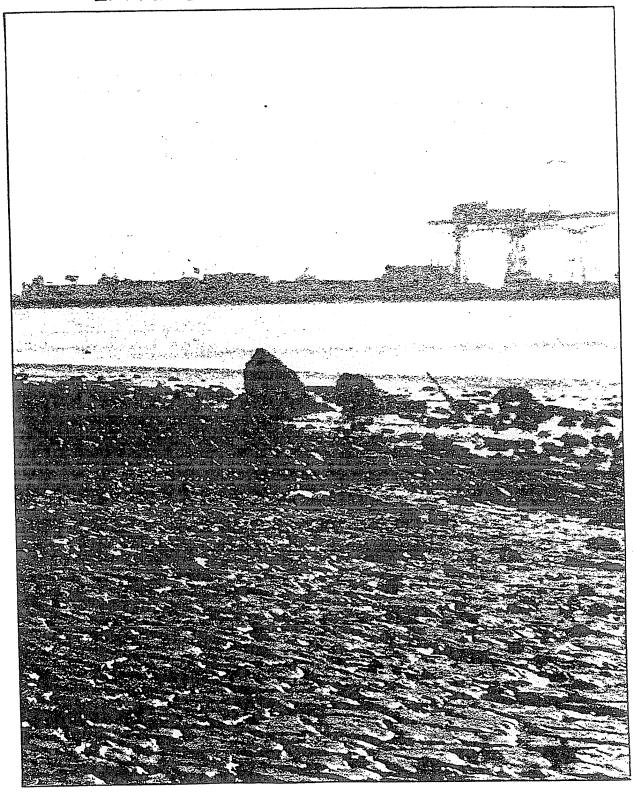
Operations

This plan recommends that the Department of Parks and Recreation, at all levels from head quarters to the state recreation area staff, develop a strong rapport with the surrounding communities. This can be achieved through training in sophisticated forms of publicity and public relations, so they can effectively communicate the unique resources of statewide significance at the state recreation area, and the circulation problems on Candlestick Stadium ballgame days.

The creative interpretation and public involvement programs will also assist visitor security in this first urban state recreation area.

On heavy Candlestick Stadium traffic days, this plan recommends that the contact station off the Hunter's Point Expressway be open for entrance only, and that all vehicles exiting during the hours of 11 a.m. to 5 p.m. on game days leave via the Bancroft Avenue/Griffith Street access point and contact station.

SUPPLEMENTAL ENVIRONMENTAL IMPACT ELEMENT



SUPPLEMENTAL ENVIRONMENTAL IMPACT ELEMENT FOR THE CANDLESTICK POINT SRA GENERAL DEVELOPMENT PLAN AMENDMENT

Introduction

This is a supplement to the Final Environmental Impact Report for the Candlestick Point State Recreation Area (SRA) General Development Plan of 1979. This supplement assesses the environmental effects caused by the changes that this General Development Plan Amendment may bring about. The General Development Plan or General Development Plan Amendment as a whole constitutes an Environmental Impact Report (EIR), as required by state law (Public Resources Code 5002.2 and 21000, et seq.).

Summary

The changes that will be brought about by this General Development Plan Amendment will cause environmetal effects similar to the effects discussed in the 1979 report. Most of the effects on the environment can be mitigated. These effects are to the soil and water quality caused by earth moving and dredging.

There will also be effects regarding energy, biotic conditions, and traffic and transportation.

Project Description

The location of the project is shown on the Land Use and Facilities Plan, and described in the Introduction of this report. The objectives of the project are also described in the Introduction. The technical portion of the plan is described in the Land Use and Facilities Plan. The intended users of this environmental document are the California State Park and Recreation Commission, which approves the General Development Plan and its amendments; the Department of Parks and Recreation, which uses the plan to guide future development; various local, state, and federal agencies which are interested in the project, and some of which need to issue permits; and interested citizens of the state and San Francisco, local neighborhood groups, especially the Friends of Candlestick Point SRA.

Environmental Setting

The environmental setting is described in the Introduction, Resource Element, and the 1979 General Development Plan.

Environmental Impact

Rather than repeat what has been written in the 1979 Environmental Element, this section will focus on the primary effects and mitigation measures for these effects.

ALTERNATIVES TO THE PROPOSED PROJECT

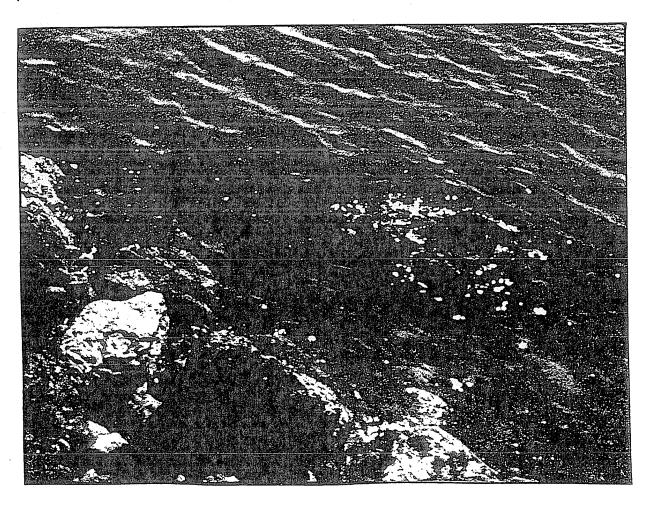
- 1. No Project There are two possibilities. One would be to continue with the development of the General Development Plan of 1979. The other would be to leave the area as it is now and not to develop further. As the plan describes, only part of the SRA has been developed. Some of the main features, including the boat access area, the Cultural Center, and the restaurant would not be developed if the plan is not implemented.
- Other alternatives are described in the 1979 report. The General Development Plan Amendment tells why a marina is not a part of this plan. Through public input, it has been decided that a quiet atmosphere at the day-use area, the beach, and the fishing piers would be emphasized. It was felt that noise and water pollution associated with a marina, and the dredging costs, would make the marina an undesirable alternative.

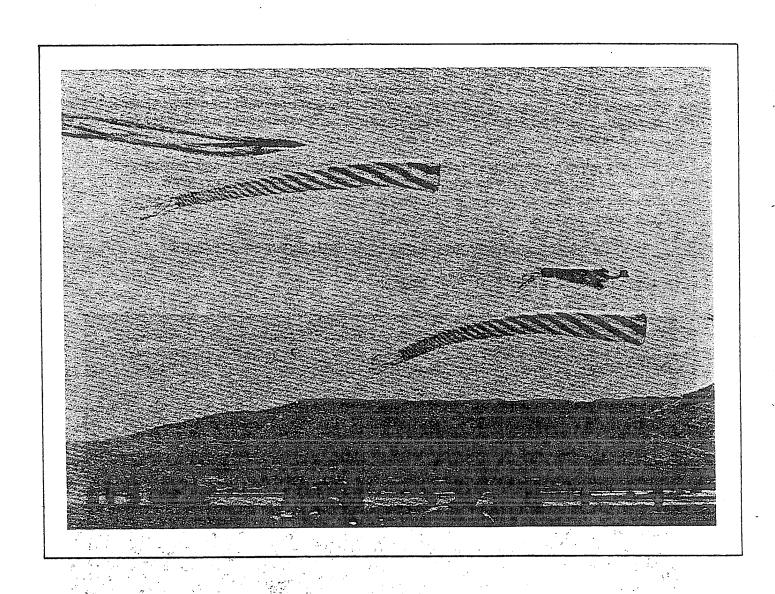
ANY SIGNIFICANT IRREVERSIBLE ENVIRONMENTAL CHANGES WHICH WOULD BE INVOLVED IF THE PROPOSED PROJECT SHOULD BE IMPLEMENTED

(See the same section in the 1979 plan.)

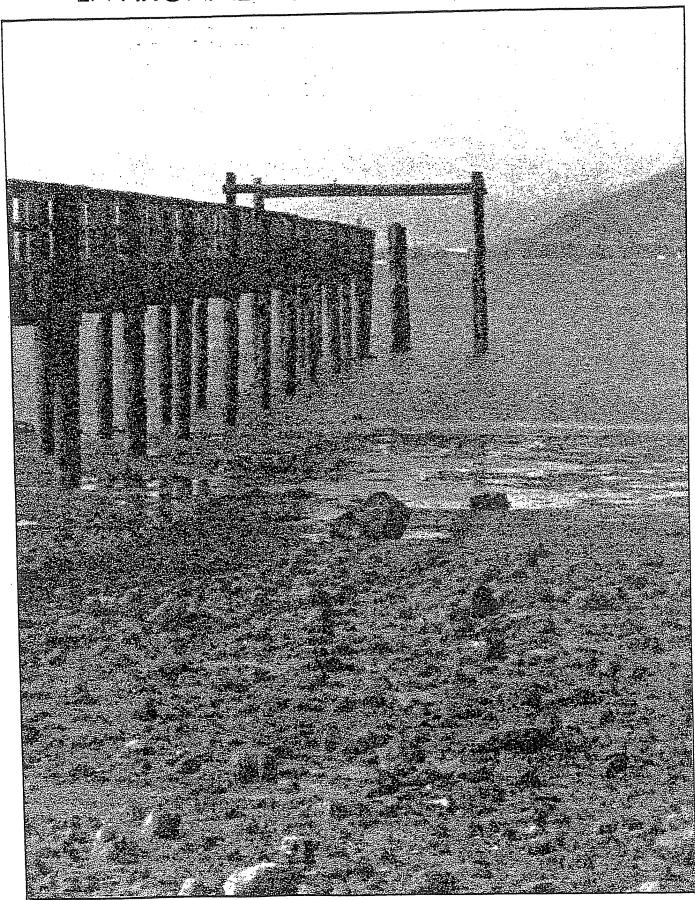
THE GROWTH-INDUCING IMPACTS OF THE PROPOSED PROJECT

(See the same section in the 1979 plan.)





ENVIRONMENTAL IMPACT ELEMENT 1979



ENVIRONMENTAL IMPACT ELEMENT 1979

The Environmental Impact Element (EIE) is divided into three major sections:

(1) description of project, (2) description of environmental setting, and

(3) environmental impact. The degree of specificity of the latter two chapters is not in detail, due to the general, broad nature of the project description. The General Development Plan for Candlestick Point State Recreation Area is broad in scope; therefore, the EIE is also a broad assessment of the potential impacts.

Description of Project

Location: See Project Description, page 4.

Objectives: See Purpose of Plan, page 3.

Project Description: See General Plan, page 17.

Description of Environmental Setting

Existing Environment: See Resource Inventory and Evaluation, page 9.

Regional Considerations: See General Plan, page 24.

Environmental Impact

An analysis was made of the interactions of the proposed development and the existing environment. In most cases, the changes will have beneficial effects on the environment. Although there will not be significant adverse effects on the environment, several impacts should be discussed.

Short-Term Effects

During construction of the proposed facilities as described in the General Plan, there will be several non-significant effects, including increased levels of noise, temporary dust, shoreline disturbance causing turbidity and water pollution, and consumption of energy.

Long-Term Effects

The proposed changes will be primarily beneficial. The environment will be drastically changed, from an unsightly dump unfit for human use to a recreation area. The natural bay ecology should improve. Several effects are described below.

Geologic Effects: The San Francisco Bay is surrounded by several active earthquake faults. The main one is the San Andreas Fault, 11 km (6.8 miles) west of the project. Since the project is on the bay fill, liquefaction is a possibility.

Soil Effects: Subsidence could occur, causing unevenness and cracks in roads and parking lots.

The land and shoreline will be reshaped, and dredging will take place. There will not be a net increase in bay fill. Rock piers will be constructed. A San Francisco Bay Conservation Development Commission (BCDC) permit will be obtained before construction and dredging.

Energy Effects: Visitors' vehicles and maintenance/administration of the SRA will consume energy.

Biotic Effects: No rare and endangered species now exist. Brown pelicans are occasionally observed in flight.

Pollution: Minor water, noise, and air pollution will occur.

Land Use: This SRA is in conformance with local, regional, and state plans.

Transportation and Parking: The SRA will affect stadium parking and traffic congestion in the vicinity. A parking and traffic circulation study has been done, and is presented in the appendix of this report. Both a map and a data sheet are included (Appendix B).

The main effect which the SRA will have on the stadium will be elimination of 3,130 parking spaces on SRA land which have been used by stadium users. Currently, the stadium provides 7,830 parking spaces, and depends on 4,220 privately owned parking spaces, plus spaces on State Park System land. As the data summary shows, 1,110 parking spaces are surplus to the needs of the capacity stadium use. Therefore, only 2,020 of the 3,130 parking spaces are for capacity stadium crowds. The data summary shows the loss will have an effect when crowds exceed the 55,000 to 58,000 range of attendance.

Capacity stadium crowds for football are approximately 61,000 persons; for baseball, they are approximately 58,000. There are approximately 80 professional baseball games per year and 10 professional football games per year held at Candlestick Stadium. This represents about 25 percent of total days per year. Normally, baseball crowds do not reach capacity, while football attendance is usually at capacity. The frequency of capacity crowds at baseball games could increase if the team became a pennant contender, or if the American League team in Oakland moves to another city.

If the 2,020 parking places are not replaced, stadium users may be forced to park on streets in nearby residential areas, thereby adding to congestion and interrupting peace and quiet in these neighborhoods.

The General Development Plan addresses the transportation issue. The SRA will provide approximately 1,250 parking places for SRA visitors. SRA traffic will be heaviest during weekends, when industrial traffic is lowest. However, on those weekends when the stadium is in use, there will be a cumulative effect on traffic congestion in the community. The heaviest use will occur 2 hours before and after games. Depending on where mitigation measures for parking losses occur, there could be less of a traffic congestion problem on game days than at present, since the 1,250 proposed spaces will be fewer than the existing 3,130 spaces which now exist on SRA lands.

Cultural: There are no archeological or historical sites on the property. All current building could be demolished without causing significant environmental impact.

Public Service and Human Community: The SRA will be maintained and administered by the Department of Parks and Recreation, with community involvement and cooperation. Utilities and sanitation are available. The department is expecting additional litter problems caused by prevailing westerly winds that will blow litter in from Candlestick Stadium and Highway 101.

Any Significant Environmental Effects That Cannot be Avoided If the Proposal is Implemented

All of the effects outlined in the above section are environmental effects that cannot be avoided if the project is implemented as proposed. Most of these impacts could be reduced through mitigations, but it is highly unlikely that any of the impacts could be totally eliminated.

The department feels that the benefits to be gained from the proposed project outweigh the minor environmental impacts that would result from implementation of the proposed plan for development.

Mitigation Measures Possible to Minimize the Significant Effects

Of all the significant effects mentioned, the most controversial relates to elimination of 2,020 needed parking spaces for Candlestick Stadium by the project. There are several possible methods that could solve the parking loss:

Use of SRA Parking: Approximately 1,250 parking spaces will be built for SRA visitors. Some of the spaces may be available for stadium users.

An Executive Park Industrial Complex: This may have 1,700 parking spaces available on weekends and evenings for stadium use. This site is between Highway 101 and the stadium. Professional football games occur on weekends, and occasionally on Monday evenings.

Land Exchange Proposal: The city has proposed a land exchange with the state. Any proposals of this kind must be studied before a trade-off is made.

Increased Public Transportation: This would substantially reduce the need for parking spaces.

Shuttle Systems: Visitors could park in other locations, and could be shuttled to the stadium.

Increased Parking: Existing stadium and private parking areas could be multi-leveled, and could include parking on turfed areas.

The proposed Hunter's Point Expressway extension (Route 230) should reduce traffic congestion on streets and in neighborhoods near the SRA, and should improve access.

$\begin{array}{c} \text{Part I} \\ \text{COMMENTS RECEIVED FROM PUBLIC AGENCIES} \end{array}$

Copies of letters and memoranda are included here and specific responses to each are found on page 73. The numbered paragraphs refer to the specific response.

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State of California

GOVERNOR'S OFFICE

OFFICE OF PLANNING AND RESEARCH
1400 TENTH STREET
SACRAMENTO 95814
(916) 445-0613

September 4, 1978

James M. Doyle Parks & Recreation Post Office Box 2390 Sacramento, CA 95811

SUBJECT: SCH# 78072432 - CANDLESTICK POINT STATE RECREATION AREA, RESOURCE MANAGEMENT

Dear Mr. Doyle:

This is to certify that State review of your environmental document is complete.

The results of the State review are attached. You should respond to the comments as required by the California Environmental Quality Act. You should address your responses to the commenting agency with a copy to the Clearinghouse.

Sincerely,

Stephen V Williamson State Clearinghouse

SAW/na Attachment

cc: Ken Fellows, DWR
Donald D. Dalke, CRWQCB
Ted T. Fukushima, State Lands
E. C. Fullerton, DFG
Charles R. Roberts, SFBCDC
Vernon J. Richey, CalTrans



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CITY AND COUNTY OF SAN FRANCISCO

DEPARTMENT OF PUBLIC WORKS

BUREAU OF SANITARY ENGINEERING

770 GOLDEN GATE AVE. 3RD FL.

SAN FRANCISCO, CAL. 94102

(415) 558-2131

September 15, 1978

Bayside Facilities Plan

2.6.0

State of California
Department of Parks & Recreation
P.O.Box 2390
Sacramento, CA 95811

Attention: Mr. James M. Doyle, Supervisor

Environmental Review Section

Subject: Candlestick Point Recreation Area

General

Dear Mr. Doyle:

The Wastewater Management Program did not obtain a copy of the subject EIR for the Candlestick Point State Recreational Area (CPRSA) until after the 45 day comment period requested in your transmittal letter of July 14, 1978 hence the lateness of our response. Our comments on subject areas of mutual concern follow:

Wet-Weather Overflow Control Facilities. The City has started detailed planning for the wet-weather overflow control facilities for the Yosemite Canal (South Basin Canal) area. Large underground sewer transport and storage facilities will have to be constructed around Yosemite Canal in order to limit wetweather overflows into the Canal. A portion of these facilities may have to be located within the proposed boundary of the CPRSA. With careful planning and inter-agencies cooperation our overflow control facilities can be made compatible with the proposed recreational area.

Shellfish. As part of the environmental studies for our wetweather overflow control facilities we have undertaken a comprehensive study of shellfish populations along the bay shoreline

Mr. James M. Doyle September 15, 1978 Page Two

from Islais Creek to Sierra Point (in San Mateo County) and have instituted a program to monitor the bacteriological quality of the two most prevalent edible species of clams (Mya arenaria and Tapes Joponica) found in this area. The field work for the population studies is complete and a report is scheduled for publication in October of this year. The bacteriological monitoring was recently begun and is tentatively scheduled to run through spring of 1979 at which time a report will be prepared.

Preliminary Results from these studies that may be of interest to you are as follows:

- Juvenile (less than 2 cm length) Mya are ubiquitous in the mud flats. Population densities over 3000 per
- square meter were recorded. However adult Mya are generally found only in rocky upper inter-tidal areas.
- Good populations of legal sized tapes were found in the rocky substrates on both sides of the narrow isthmus leading out to the southeasterly point, Fair numbers of Tapes were found in Yosemite Canal and in all suitable substrate areas along the south side of the proposed CPSRA.
- Fecal coliform levels in four of the six samples of clams collected in the area for the proposed CPSRA exceed the FDA limit of 230 MPN/100 gms. A composite sample of Tapes and mya collected in the Yosemite Canal just east of Griffith Street had a fecal coliform level more than 100 times the FDA standard. These samples were collected between 7/19/78 and 8/23/78, a period of no rainfall, therefore wet weather overflows could not be the cause for the high coliform readings.
- Contrary to the considerable amount of shell debris of the bent-nosed clam (Macoma nasuta) found all along the shoreline, living memebers of this species are virtually non-existent.
- Tapes are now being recreationally harvested both for fish bait and human consumption in the CPRSA and adjacent areas.

We would be pleased to provide you with any information we have on shellfish in this area and would appreciate receiving reports of any field studies of shellfish you may undertake. Mr. James M. Doyle September 15, 1978 Page Three

Water Quality Monitoring. We are interested in the water quality monitoring station to be proposed for the Nature Education Center as we have on going shoreline water quality monitoring requirements. It should be a relatively simple matter to strucutre the monitoring station to provide the needed data to meet the requirements of both agencies.

Since planning for the CPSRA involves several subjects of mutual interest a meeting between our agencies may be appropriate. If you would like to arrange such a meeting or desire additional information please give me a call at (415) 558-2131. If I am not available please contact Dave Jones at (415) 558-2613. If you have any additional data of shellfish I would appreciate an early response so that we can incorporate this data in our report on shellfish.

Very truly yours,

H. C. Coffee

Project Manager

Bayside Facilities Planning

SAN FRANCISCO BAY REGION

INTERNAL MEMO

File No. 2176.05(DDD)DR

TO: DIA	ME MAYARRO, DEPT. OF WATTER	FROM: _	DONALD D. DALKE, SECTION LEADER					
-	OURCES, RESOURCE EVALUATION NETTE AUGUST 4, 1972	- SIGNATI	SAIN MATEO COUNTY TRE: DEnceCal Double					
SUBJECT:	RESOURCE MANAGEMENT PLAN, GENEL IMPACT REPORT FOR THE CAMPLEST	RAL DEVEI ICK POIM	OFFENT PLAN, AND ENVIRONMENTAL STATE RECREATION AREA PROJECT					
	Collowing comments are offered regar	rding the	Environmental Impact Report for					
1.	The impact of discharge of untrea San Francisco Bay during the wet	ted sewa(weather !	ge into the South Basin Channel of Deriod should be considered.					
2.	Irritation practices should be defined. If reclaimed wastewater is considered for irrigation, use areas should be well defined, as well as necessary degree of treatment of wastewater; and the sources of such wastewater.							
3.	Inactive Disposal Site							
	The inactive waste disposal sites Minimum Criteria for Proper Closu Sites, Resolution No. 77-7 (attac	re of Cla	nply with this Regional Board's ass II Solid Waste Disposal					
If yo	ou have any questions with regard t	to this,	please call Anders Lundgren at					

Attachment:

Resolution No. 77-7

cc: SWRCE

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Division of Planning & Research Environmental Analysis Unit

SAN FRANCISCO BAY CONSERVATION AND DEVELOPMENT COMMISSION

30 VAN NESS AVENUE SAN FRANCISCO, CALIFORNIA 94102 PHONE: 557-3686



August 23, 1978

Office of Planning and Research State Clearinghouse 1400 lOth Street Sacramento, California 95814

SUBJECT: SCH #78072432 and BCDC Inquiry File No. SF.SB.6613.13

Gentlemen:

- Thank you for the opportunity to review the Candlestick Point State Recreation Area Resource Management Plan and Environmental Impact Report. Although the Commission has not had an opportunity to review the report, the staff has reviewed the document in light of the McAteer-Petris Act and the San Francisco Bay Plan, and would like to offer a few comments at this time.

Jurisdiction

The Commission has jurisdiction over San Francisco Bay and all areas within 100 feet of the line of highest tidal action. It appears that a permit will be required since the project will entail some fill in the Bay for fishing facilities and dock construction as well as the dredging proposed for marina construction. In addition, there will be construction of recreational facilities within the 100-foot shoreline band.

Park Use

The proposed park is consistent with the San Francisco Bay Plan and the McAteer-Petris Act. Bay Plan Map No. 10 shows the eastern and southern shoreline at Candlestick Point as a park priority use area. The park plan indicates that some fill would be placed. So long as the fill is the minimum amount necessary, and would be for the purposes of improving shoreline appearance and providing new public access to the Bay, the fill could be found by the Commission to be consistent with the fill policies of the Act and Plan. We did note that a comfort station might be located on fill or near the shoreline. We suggest this facility be moved inland to conform better with the Commission's policies on shoreline use.

MAPS

Office of Planning and Research August 23, 1978 Page Three

Expressway

In all alternatives the expressway appears to have been relocated so that it is farther from the shoreline than in some of the original proposals. The location appears to allow for more public access to the Bay.

Dredging

The amount of dredging that would be required should be determined and the environmental report should discuss dredging in more detail, including the frequency of maintenance dredging and the location of dredged spoils disposal.

The EIR on the General Development Plan seems to cover impacts which can be determined at the master plan stage. We may have further comments on the project when a single detailed plan is developed and circulated for comment.

Very truly yours,

CHARLES R. ROBERTS Executive Director

· CRR/st

cc: L. Frank Goodson, Resources Agency

Memorandum

To : L. Frank Goodson Resources Agency Date : August 21, 1978

File No.: SD 78-07-24

James M. Doyle

Department of Parks and Recreation

P.O. Box 2390

Sacramento, California 95814

From : EXECUTIVE OFFICE

1807 13th Street, Sacramento 95814

Subject: Comments to Candlestick Point State Recreation Area-

Resource Management and General Development Plan - Draft EIR

SCH #78072432

The staff of the State Lands Commission has reviewed the subject document and offer the following comments:

The project area, according to the report, is comprised of (1) sold and filled Board of Tideland Commissioners' (BTLC's) lots; (2) sold and unfilled BTLC lots; (3) Pueblo lands of San Francisco; (4) lands which the State disposed of under patents; (5) lands condemned by the federal government under suit U.S.D.C. #36272; and (6) lands granted in trust to the City and County of San Francisco under Chapter 1333, statutes of 1968, minerals reserved.

At the present time, there are serious questions concerning the ownership of the BTLC lots and they may be subject to permit or leasing requirements of the State Lands Commission; title to lands similar in nature is now being litigated in the case of Murphy v. City of Berkeley, Alameda County Superior Court No. 422942. Since the question of the State's interest remains unresolved, a permit or lease will not be required at this time. This action, however, does not constitute, nor shall it be construed as, a waiver of any right, title or interest by the State of California in any lands under its jurisdiction.

Also, since titles are complex in the subject area, it is recommended that all the principals confer with the State Lands Commission prior to the adoption of final development plans and the consummation of land exchanges. In so doing, it is hoped to avoid legal problems in the future particularly with respect to the land exchanges. It is anticipated that each such issue will be handled on a case-by-case basis.

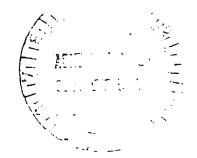
Lukus hims

Should there be further questions, please contact Mr. Herbert Maricle at (916) 322-7822.

TED T. FUKUSHIMA Senior Planner

TTF:sp

cc: H. Maricle



August 11, 1978

4-SF-101, 230

Comments of Caltrans, District 4, concerning the Draft Environmental Impact Report for the Candlestick Point State Recreation Area, State Clearinghouse No. 78072432.

The DEIR should describe the effect of traffic generated by the Recreation Area upon Route 101 and the proposed future Route 230, particulary during the evening peak hour and when events are held at Candlestick Park Stadium.

Thank you for the opportunity to comment on this DEIR. We would appreciate receiving a copy of the Final EIR.

VERNON J. XICHEY

Deputy District Director

7:1

Aemorandum

: Mr. Huey D. Johnson Secretary for Resources 1416 Ninth Street Sacramento, California 95814

Attn: L. Frank Goodson

Projects Coordinator

Date: August 4, 1978

..om : Department of Fish and Game

ubject: Draft EIR, Candlestick Point State Recreation Area, Resource Management Plan, General Development Plan, San Francisco County; SCH 78072432

The Department of Fish and Game has reviewed the subject report and has the following comment.

We are in agreement with the report's Preliminary Single Plan and believe the project will benefit fish and wildlife.

E C Julian

Part II RESPONSE TO COMMENTS

RESPONSE TO COMMENTS

on a Preliminary Candlestick Point State Recreation Area Resource Element, General Plan, and Environmental Impact Report

The comments received for the preliminary Candlestick Point State Recreation Area Resource Element, General Plan, and Environmental Impact Report were:

(1) found to be substantial, and the text was revised and/or a response was given; (2) the comments were not substantial but required a minor change in the text and/or a brief response; or (3) the comments provided information or were supportive and did not require a response.

The responses below correspond to the number to the right of the comments, for conditions (1) or (2) above.

- 1. We recognize the problem involved in a wet weather overflow control facility for the Yosemite Canal (South Basin Canal area). We understand that alternatives are being studied. If a portion of the overflow control facilities were to be located on Candlestick Point State Recreation Area land, an encroachment permit will be required. A possible conflict may result with a proposed overflow control construction and the State Recreation Area's proposed nature area.
- We would be very interested in receiving information on the shellfish in the bay in your area of study. Our Department has not undertaken a shellfish study along the bay but will send you data if we should do so. The reference to the bent nose clam in the Resource Management Plan will be changed in the text.

- 3. We would be glad to plan and construct a water monitoring equipment station to meet the needs of both our agencies.
- We would be happy to meet and discuss areas of mutual interest between our two agencies.
- 5. As indicated in item number 1, the Bureau of Sanitary Engineering,
 Department of Public Works, the City and County of San Francisco are
 interested in eliminating these problems concerning health.
- 6. We will not use reclaimed wastewater for irrigation. Both domestic and irrigation water needs will be supplied by the San Francisco Water Department.
- 7. The inactive waste disposal site is not a Class II solid waste disposal site as you mentioned, but is a Class III site. As such, it does not come under Resolution 77-7 with the San Francisco Bay Regional Water Quality Control Board Resolution minimum criteria for proper closure of Class II solid waste disposal sites. However, we do recognize a leachate problem because of past illegal dumping of undesirable material at Candlestick Point State Recreation Area. We will work closely with Water Quality Control Board to meet the closure of this dump site and to remedy leachate problems when they occur.
- 8. The Department will work closely with San Francisco Bay Conservation and Development Commission. All proposed developments will require BCDC

permit approvals. Extensive fill is not contemplated, but dredging of the bay and minimum of filling and construction within 100 feet of the shoreline will be done as authorized by a permit.

- 9. The plan indicated that the shoreline changes will be minimal. These changes will benefit the mud flat marsh and habitat of flora and fauna, accessibility to the shoreline, and the general aesthetics of the shoreline. Specific locations of facilities have not been firmly established.
- 10. The Department's Concessions Section will work closely with BCDC in location of the restaurant.
- 11. Alternatives showing a large marina development are not contemplated since this can best be done by private enterprise and in better locations elsewhere in the bay.
- 12. The expressway as it appears in the alternatives and the proposed General Development Plan are the same and are accurately shown on the plan.
- 13. The amount of dredging and fill will be balanced and held to a minimum.

 Our dredging spoils will be used as fill on project lands as contemplated.
- 14. Whenever a specific phase of the overall plan is budgeted and proposed for implementation, a more detailed and specific environmental assessment will be prepared for that particular project as part of the budget package.

- 15. The Department is aware of these problems and agrees that litigation is required to solve complex title questions.
- 16. The proposed State Recreation Area will generate traffic and influence traffic on U.S. 101 and the proposed Route 230 and other neighborhood surface streets in this portion of San Francisco. We believe that the traffic will not add significantly to the traffic congestion because:

 (a) the traffic will not usually be leaving or arriving at the State Recreation Area at one particular time and will not usually conflict with sporting events or with rush hour traffic; (b) most traffic to the State Recreation Area will be on weekends rather than weekdays, therefore, conflicting less with rush hour traffic; (c) as indicated on pages 59 and 60, during capacity crowd events at Candlestick Stadium, the cars visiting the stadium might actually park on State Recreation Area parking lots as they are doing so now; (d) the actual number of people visiting the State Recreation Area will be fairly insignificant to the overall traffic patterns in the area.

Comments and Responses General Plan Amendment and Draft Environmental Element (1987) Candlestick Point State Recreation Area

Review copies were provided to the following governmental agencies, organizations and private citizens:

State Clearinghouse (10 copies) Honorable Pete Wilson, United States Senator Honorable Alan Cranston, United States Senator Honorable Barbara Boxer, Member of Congress Honorable Milton Marks, Member of the Senate Honorable Quentin Kopp, Member of the Senate Honorable Willie L. Brown, Jr., Speaker of the Assembly Honorable Art Agnos, Member of the Senate Office of the Mayor, City of San Francisco Honorable Doris M. Ward, Council Member Honorable Willie B. Kennedy, Council Member Honorable John Molinaro, Council Member Honorable Bill Maher, Council Member Honorable Carol Ruth Silver, Council Member Honorable Richard Hongisto, Council Member Honorable Thomas Hseih, Council Member Honorable Jim Gonzales, Council Member Honorable Harry Britt, Council Member Honorable Wendy Nelder, Council Member Association of Bay Area Governments City and County of San Francisco, Department of Planning City and County of San Francisco, Department of Clean Water City and County of San Francisco, Recreation and Park Department San Francisco Municipal Railway, Mr. Peter Straus San Mateo County Planning Commission San Mateo County Department of Parks and Recreation United States Navy, Hunter's Point Shipyard United States Army, Corps of Engineers United States Department of the Interior, Office of the Secretary United States Department of the Interior, Golden Gate National Recreation Area United States Department of the Interior, Fish and Wildlife Service City of Brisbane Metropolitan Transportation Commission San Francisco Chamber of Commerce U.C. Cooperative Extension, Connie Ryan U.C.S.F., Recreation Department, Al Minvielle S. F. State, State Sailing Program, Jeff Watt S. F. State, Physical Education Department, Paul Rundell Sierra Club, State Park System Task Force, Dr. Robert Mark Sierra Club, State Park System Task Force, Murray Rosenthal Sierra Club, San Francisco Bay Chapter San Francisco Planning and Urban Removal Sea Trek, Bob Licht S. F. Sailboards, James Flippen Oceanic Society, Jane Piereth

3

Marine Ecological Institute Save San Francisco Bay* The Yerby Corporation Groundswell, Sharon Pollack & Leslie Simon Lewis Baltz Bill and Mary Buchen Judy Chan Claudia Chaplain Mattie Duhon Alain Gerbault George Hargreaves Lisa Hein Doug Hollis* Leonard Hunter David Ireland George Iwao Muhammed Al-Kareem Albert Kurz* Mack Manuel Neves, Jr. John Rol_off P. J. Ryan Martha Schwartz San Francisco Progress The Sun Reporter

^{*}Returned with no forwarding address.

A notice announcing location of copies of documents for public review was published in the following newspaper:

The San Francisco Chronicle

Documents were available at the following locations for public review:

Department of Parks and Recreation Central Coast Region Headquarters 2211 Garden Road Monterey, CA 93940

San Francisco Main Library Larkin and McAllister Streets San Francisco, CA 94102

Visitacion Valley Branch Library 45 Leland Avenue San Francisco, CA 94134

Bernal Branch Library 500 Courtland Avenue San Francisco, CA 94110

Department of Parks and Recreation San Francisco District Office 1150 Carroll Avenue San Francisco, CA 94134

Portola Branch Library 2434 San Bruno Avenue San Francisco, CA 94134

Warden Branch Library 5075 3rd Street San Francisco, CA 94124

Comments were received from the following agencies, organizations and individuals:

U. S. Army, Corps of Engineers, S. F. District

California Department of Boating and Waterways California Department of Conservation

City and County of San Francisco, Department of City Planning City and County of San Francisco, Clean Water Program San Francisco Municipal Railway City and County of San Francisco, Recreation and Park Department** County of San Mateo, Division of Parks and Recreation

Mr. George Iwao Mr. A. Kurz

^{**}These comments arrived after the end of the review period. No response was made to late comments.

Comments and Responses to Comments

Following are the comments received. Each comment has been given a number, and the response to that comment has the same number.



DEPARTMENT OF THE ARMY

SAN FRANCISCO DISTRICT, CORPS OF ENGINEERS
211 MAIN STREET
SAN FRANCISCO, CALIFORNIA 24105 - 1905

March 13, 1987

Environmental Branch

To: Mr. James M. Doyle
Environmental Review Section
Department of Parks and Recreation
P.O..Box 942896
Sacramento, California 94296-0001

Subject: Candlestick Point State Recreation Area General Plan Amendment & DEIR

Your request for comments from this office was received on 12 February 1987 by your letter dated 6 February 1987.

The proposed activity is an administrative action and therefore will not require Department of the Army authorization. However, any construction resulting from this action may require Department of the Army authorization. For additional information please contact our Regulatory Functions Branch at 415-974-0418.

Any impacts on wetlands, threatened or endangered species, other valuable fish and wildlife resources, or on cultural resources are among the important environmental considerations for all Corps permit applicants. Other areas of environmental concern specific to this project are: Water quality related to dredging and disposal. The San Francisco Bay Regional Water Quality Control Board has recently required extensive chemical and biological water quality testing for projects in the Hunters Point area. The Hunters Point area has been identified by the RWQCB as a "toxic hotspot".

Questions concerning our AB 884 review can be referred to the undersigned at 415-974-0443. Thank you for including us in your review process.

Roderick A. Chisholm, II

Environmental Branch

Planning/Engineering Division

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7-166

Memorandum

To : Dr. Gordon F. Snow
Assistant Secretary for Resources

James M. Doyle
California Department of Parks
and Recreation
P.O. Box 942896

Sacramento, CA 94296-0001

From : Department of Conservation-Office of the Director

Date : MAR 1 2 1987

Subject: Draft EIR for General Plan Amendment for Candlestick Point Stat

The Department's Division of Mines and Geology (DMG) has reviewed the Draft EIR for the General Plan Amendment for Candlestick Point State Recreation Area, San Francisco County, California.

We would agree with the DEIR's conclusion that the settlement of land fill is a significant hazard at this site (Page 11, DEIR). The hazard could be potentially greater if settlement is caused by severe seismic shaking from an earthquake in the region. This is particularly true for project development sites that might be occupied by members of the public, such as the indoor theater at the cultural program center.

We feel that the geologic impact of potentially adverse soil conditions, particularly in combination with earthquake shaking needs further clarification in the EIR. We recommend that the proposed test borings and site soils analysis (page 41, DEIR) which would address such problems as settlement, differential settlement, and seismically induced liquefaction be conducted now and added as a supplement for the Final EIR.

We also recommend that specific mitigation be proposed so as to significantly reduce any geohazards defined by these investigations.

If you have any questions regarding these comments, please contact Zoe McCrea, Division of Mines and Geology Environmental Review Officer, at (916) 322-3202.

Dennis J. O'Bryant

Envirnomental Program Coordinator

DJO:ZM:lah] 0186H

Enclosure

c: Zoe McCrea, Division of Mines and Geology Richard Kilbourne, Division of Mines and Geology

STATE

87



March 17, 1987

Mr. James M. Doyle, Supervisor Environmental Review Section State of California - Resources Agency Department of Parks and Recreation P.O. Box 942896 Sacramento, CA: 94296-0001

Re: Candlestick Point State Recreation Area Draft Environmental Impact Report

Dear Mr. Doyle:

Thank you for the opportunity to comment on the above-referenced document.

Our primary comments relate to transportation impacts, which you mention in your document. We would hope that, as much as possible, the areas where vehicles currently park for large events at Candlestick Park would be among the last development areas for your recreation area. Additionally, we recommend that you consider posting Notice of Candlestick Park events at some places within the recreation area to try to alleviate potential transportation impacts.

2 With regard to the potential sewer project along the shoreline, you may want to consider coordinating construction schedules with our Clean Water Program.

I am also enclosing comments from Muni, which were transmitted to us for inclusion in our comment letter.

If you have any questions about our comments, please feel free to call me directly at 558-5261.

Sincerely,

Paul Maltzer

Office of Environmental Review

cc - Dan Wond

PEM25

(415) 558-4656

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San Francisco, CA 94102

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Department of Environmental Management



COUNTY GOVERNMENT CENTER . REDWOOD CITY . CALIFORNIA 94063

BOARD OF SUPERVISORS

ANNA G. ESHOO TOM HUENING TOM NOLAN WILLIAM J. SCHUMACHER

DAVID A. CHRISTY

(415) 363-4020

February 18, 1987

Mr. James M. Doyle, Supervisor Environmental Review Section State Department of Parks and Recreation P. O. Box 942896 Sacramento CA 94296-0001

Dear Mr. Doyle:

Thank you for the opportunity to review the Candlestick Point State Recreation Area General Plan Amendment.

As noted in the report, there is a strong visual relationship between Candlestick Point and San Bruno Mountain State and County Park. We would like to see this visual relationship strengthened even more by a trail connection.

We refer you to the General Plan, San Bruno Mountain State and County Park (copy enclosed) Page 71, "Trails." There are numerous possibilities for trail links between the two areas. We would be happy to work with you in developing these possible links.

Sincerely,

David A. Christy, Director

Parks and Recreation

DAC:HD:bl Enclosures

cc:

Paul M. Koenig, Director, Environmental Management Harry Dean, Chief, Planning and Development Kendall R. Simmons, Superintendent of Parks

Ron Weaver, Park Ranger IV

DSK30-13

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FEP 2 7 037

2739 Balboa Street San Francisco, CA 94121 20 March 1987

MR. JAMES M. DOYLE, Supervisor Department of Parks and Recreation P.O. Box 942896 Sacramento, CA 94296-0001

Dear Sir:

I thank you for the opportunity to make comments on the CANDLESTICK POINT STATE RECREATION AREA GENERAL PLAN AMENDMENT, including DRAFT ENVIRONMENTAL IMPACT REPORT.

The limited interest of my concern is in the BOAT ACCESS FACILITY.

Sheet 1 of 1, Drawing No. 22452 indicates a grassy area between the Trailer Parking Area and the Launching Ramp which should be shown as a paved area.

Yours truly,

George Isao

Member of Friends of Candlestick

Point, Inc.

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MAR 23 1987

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SAN FRANCISCO CLEAN WATER PROGRAM

City and County of San Francisco

Mailing Address: P.O. Box 360, San Francisco, California 94101

770 Golden Gate Avenue (415) 558-2131

March 18, 1987

2.1.19.5

(415) 431-9430

James M. Doyle, Supervisor Environmental Review Section California Department of Parks and Recreation P. O. Box 942896 Sacramento, CA. 94296-0001

RE: Candlestick Point State Recreation Area General Plan Amendment, Including Draft Environmental Impact Report 86123007

Dear Mr. Doyle:

The San Francisco Clean Water Program is currently planning the Sunnydale Facilities to collect and transport combined storm and wastewater flows in the Southeast section of San Francisco near the County line. During the past year, we have coordinated with State Parks and Recreation staff to assure that our project would be compatible with recreation plans.

As our planning and design work proceeds and as we commence construction activities, we will continue to coordinate with State Park and Recreation staff.

We appreciate this opportunity to comment on this General Plan Amendment.

Very truly yours,

Harold C. Coffee

Project Manager

Bayside Facilities Planning

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SAN FRANCISCO MUNICIPAL RAILWAY 949 PRESIDIO AVENUE, SAN FRANCISCO, CALIF 94115 415 673-6964

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MEMORANDUM

FEB 2 3 1987

city & county of 8.F. DEPT. OF CITY PLANNING

TO:

Barbara Sahm, OER, Department of City Planning

THROUGH:

Paul Toliver, Deputy General Manager and Chief Transportation

Officer Mul Toleve Peter Straus, Director of Service Planning

FROM:

K.L. (Dan) Wong, Environmental Review Coordinator

DATE:

February 23, 1987

SUBJECT:

Candlestick Point State Recreational Area General Plan Amendment

(Preliminary) and Draft Environmental Impact Report

The following is based upon this department's review of the Candlestick Point State Recreational Area General Plan Amendment (Preliminary) and Draft Environmental Impact Report dated February, 1987.

PAGE NUMBER

COMMENT(S)

24

MUNI still supports the concept of transit lines serving recreational areas in and around the City. However, due to funding constraints, MUNI cannot extend service on either the 29-SUNSET and the 56-RUTLAND, the two closest MUNI lines to Candlestick Point State Recreational Area, without additional funds from either the City or the State.

In addition to funding problems, extending service would also have operational problems. For instance, parking lot improvements would be required at 1150 Caroll (Candlestick Point State Recreational Area Headquarters) before MUNI could use it as a layover terminal for any MUNI line which is extended to serve the area.

The two proposed bus stops mentioned in the report for Candlestick Point State Recreational Area would require the extension of a MUNI line.

For additional information regarding MUNI's official position here, please refer to the attached letters from H. Welton Flynn, PUC Commissioner, to Carol Nelson, California 2continued

State Department of Parks and Recreation, dated April 21, 1986, and from William G. Stead, MUNI General Manager, to John Taylor, Clerk of the Board, dated September 29, 1986.

93

In Appendix A, the report listed Tom Matoff as the contact person for MUNI. This should be changed as Mr. Matoff left MUNI several years ago. For your future reference, the MUNI contact person is Peter Straus, MUNI's Director of Service Planning, at 923-6100.

If there are any additional questions regarding these comments, please contact me at 923-6100.

3712P attachments

cc: D. Wright



March 23, 1987.

Mr. James M. Doyle, Supervisor Environmental Review Section Department of Parks and Recreation Resources Agency P.O. Box 942896 Sacramento, CA 94296-0001

Re: Candlestick Point State Recreation Area Plan and DEIR; Amendment to the Original General Development Plan Approved by State Park and Recreation Commission - November 1978

Dear Mr. Doyle:

The San Francisco Recreation and Park Department has reviewed the General Plan Amendment and Supplemental Environmental Report to the Original Development Plan approved in 1978 for the Candlestick Point State Recreation Area. The proposed development will greatly enhance the recreational opportunities available in the Bay Area. However, as with the original plan, the proximity to Candlestick Park will result in impacts to traffic and parking during periods of heavy stadium use.

These impacts require continued coordinated planning and the development of effective mitigation measures. In particular, eliminating over 3,000 parking spaces on State Recreation Area land, which have been available to stadium users, would result in parking impacts on days when crowds exceed 55,000 (football crowds reach 61,000). If the parking spaces are not replaced, stadium users may be forced to park on residential streets, thereby impacting surrounding neighborhoods. The recommended construction of a multi-level parking garage at the stadium is not considered a reasonable mitigation action at this time.

Additionally, the cumulative effect of traffic congestion during weekends when the stadium is in use would impact Harney Way as well as other access roads to the area. The proposed realignment of Carroll Avenue and Fifth Street needs clarification. A map showing the realignment plan would be helpful.

Other concerns regarding the proximity to Candlestick stadium include measures to control unauthorized use of proposed park facilities and parking spaces by stadium patrons and litter on game days. Is it envisioned that State Park Rangers would have this responsibility?

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It should also be noted that since the time of the 1978 Candlestick Point Development Plan, other recreation plans have been initiated for parks serving the same general region. Coordination of these planning efforts is recommended to take advantage of opportunities for developing facilities and programs that compliment each other and provide the fullest range of possible recreational experiences to Bay Area residents and visitors. For example, a revised Master Plan for McLaren Park, a little over two miles west of Candlestick Point, is being prepared. Some of the facilities and activities planned for McLaren Park are similar to those proposed for Candlestick Point. The McLaren Plan also includes the development of a park center/meeting hall and adventure park similar to what is proposed as the cultural program center in the Candlestick Point Plan. Coordinated planning could ensure that these facilities compliment each other rather than duplicate each other. Similarly, the nature study area, hiking trails and group picnic areas in the respective plans could offer a variety of recreation and educational experiences if plans are well coordinated.

In summary, the Recreation and Park Department appreciates the opportunity to comment on this Development Plan Amendment and Environmental Supplement and looks forward to a coordinated planning effort on the implementation of the plan. Please contact Deborah Learner at 558-3182 to discuss the above mentioned concerns and issues and to exchange information regarding City recreation plans in the area of Candlestick Point.

Sincerely,

MARY E. BURNS General Manager

MEB/DL/vr

cc: Deborah Learner Carol Nelson

Response to Comments

Army Corps of Engineers

- This comment noted. We will coordinate with your Regulatory Functions Branch.
- 2. We will also coordinate with the San Francisco Bay Regional Water Quality Control Board. A February 19, 1987 Preliminary Contamination Study and Soil Investigation Proposed Tidal Channel Improvements, Candlestick Point State Park (sic), San Francisco, California, was done for the Office of the State Architect by Berlogar Geotechnical Consultants. This study is available for review in the office of this Department's Development Division.

State Department of Boating and Waterways

- This project will not have a significant effect on navigation in California's waterways.
- 2. This project will not affect beach erosion.
- This project includes boat launching facilities, but does not include a marina.
- 4. The administrative area is a necessary part of the project. It will not occupy a large area, and will be used to help operate and maintain the State Recreation Area.

California Department of Conservation

- 1. Buildings and other facilities will be designed and constructed to meet earthquake standards. Most will be one story. The cultural center theater will be two story.
- The Geotechnical Consultant's report, discussed in Army Corps of Engineers response number 2, is available in the office of our Development Division.
- Specific building designs for public safety and structures that can withstand seismic activity will be available during the budget phase.

San Francisco Department of City Planning

1. Overflow parking for stadium use presently occurs on undeveloped SRA lands. As these lands are developed over the next few years, fewer spaces will be available for stadium crowds. The City has been aware of this. We will keep you informed about our construction schedule. Posting notices of Candlestick Park (stadium) events in the SRA is a good idea.

2. We will coordinate with the S. F. Clean Water Program.

San Francisco Municipal Railway

- We would like to see the transit lines extended to Candlestick Point SRA. The improvement to roads and parking lot proposed for the SRA should make this possible. We would like to work with you in this regard.
- These comments were noted.

San Francisco Clean Water Program

1. These comments were noted.

County of San Mateo, Parks and Recreation Division

 Yes, we would like to meet with you to discuss the possibility of linking trails from the San Bruno Mountain State and County Park to Candlestick Point State Recreation Area.

Mr. George Iwao

1. You are correct. The area between the parking lot and boat access facility should be shown as a paved roadway.

Mr. Albert Kurz

- 1. The information you supplied about the flora and fauna has been noted.
- 2. A nature area has been proposed for Candlestick Point State Recreation Area.
- 3. The boulder area (concrete slabs and rubble) which you discussed will eventually be landscaped and developed for SRA purposes. Perhaps some area can be provided for existing wildlife as you mentioned. This is not a part of the plan concept at present.
- 4. Wildlife is found in other areas within the City and County of San Francisco.

B-2931L

APPENDIX A

Public Assistance Resources

The Candlestick Point State Recreation Area general planning project has developed a complex network of public contacts. To benefit the future planners and designers, the following list was compiled of organizations whose interest, knowledge, and service may be of further assistance in implementation of the proposed general development plan.

Marine Resource Assistance

State of California

Department of Fish and Game

Sacramento Headquarters, 1416 Ninth Street, 12th Floor, Resources Building, Sacramento, CA 95814

Information - (916) 485-3531

Office of Director - (916) 485-3585

Conservation Education - (916) 485-7613

Anadromous Branch Fisheries - (916) 485-8231

Environmental Branch Services - (916) 485-1383

Marine Resources Branch - (916) 485-8386

Planning Branch - (916) 485-8393

Wildlife Management - (916) 485-5561

Wildlife Protection - (916) 454-7243

Library - (916) 485-7752

Order Section - (916) 492-0747

Regional Offices

Yountville - Region III - 7329 Silverado Trail, P.O. Box 47 (94599)

Information - ATSS 577-1109; Public, (707) 944-2011
Regional Manager - ATSS 577-1109; Public, (707) 947-2011
Environmental Services Supervisor Fisheries Management Supervisor Information Officer - ATSS 577-1109; Public, (707) 944-2011

Marine Research Laboratories

Monterey Marine Cultural Lab., Granite Canyon Coast Rte. (93941); (408) 642-0225

Marine Research Branch Offices

Fort Bragg - P.O. Box 1309 (95437; (707) 964-9078 Menlo Park - 411 Burgess Dr. (94025); (415) 326-0324 Monterey - 2201 Garden Road (93940); (408) 587-2870 Department of Boating and Waterways Sacramento, 1629 S Street (95814-7291)

Information - ATSS 485-2615; Public, (916) 445-2615
Executive Director - ATSS 485-6281; Public, (916) 445-6281
Assistant Director - ATSS 485-9657; Public, (916) 445-9657
Boating Facilities Division - ATSS 485-9657; Public, (916) 445-9657
 Planning - ATSS 492-1800; Public, (916) 322-1800
 Local Assistance - ATSS 485-9659; Public, (916) 445-9659
 Capital Outlay - ATSS 485-2085; Public, (916) 445-2085
 Beach Erosion - ATSS 485-8349; Public, (916) 445-8349
Boating Operation Division - ATSS 485-2427; Public, (916) 445-2427
 Education, Safeway, Regulations - ATSS 485-2427;
 Public, (916) 445-2427

Local Organizations

The Oceanic Society
San Francisco Bay Chapter
Administrative Director
Building E, Fort Mason
San Francisco, CA 94123
- (415) 441-5970

Marine Ecological Institute 811 Harbor Boulevard Redwood City, CA 94063 (415) 364-2760

Save San Francisco Bay Association 2140 Shattuck Avenue Berkeley, CA 94704 (415) 849-3053

Local Organizations and Individuals for Pacific Seafaring Traditions

San Francisco State Sailing Program c/o Jeff Watt 1007-1/2 Burlingame Burlingame, CA 94010

San Francisco State Physical Education Department Attention: Paul Rundell 1600 Holloway Avenue San Francisco, CA 94132 (415) 469-2244

University of California at San Francisco Recreation Department Attention: Al Minvielle 500 Parnassus Avenue San Francisco, CA 94143 (415) 476-1000 Environmental Traveling Companions
Attention: Diane Pauloski
Fort Mason, Building "C", Room 360
San Francisco, CA 94123
(415) 474-7662

Sea Trek
Attention: Bob Licht
Schoonnaker Point
Sausalito, CA 94965

San Francisco Sailboards
Attention: Jim Flippen
623 Valencia Street
San Francisco, CA 94110
(415) 864-5867

Connie Ryan, Marine Advisor
University of California Cooperative Ext.
P.O. Box 34066
San Francisco, CA 94134
(415) 586-4115

Rev. Ale Pele
National Office of Samoan Affair
1855 Folsom Street
San Francisco, CA 94110
(415) 626-0161

Manny Neves
136 Peabody Street
San Francisco, CA 94134
(Hm.) 584-3477; (Wk.-eve.) 467-1777

Lloyd Smalley 222 Bodega Petaluma, CA 94952 (707) 762-5836

Allan Wilson 482 - 23rd Avenue San Francisco, CA 94121 (415) 221-2687

Jan Allianic
Pacific Educational Network
P.O. Box 188306
Sacramento, CA 95818
(Hm.) (916) 429-8254; (Wk.) (916) 322-4568

Dr. James Mays
President, Apprenticeshop
87 Upenuf Road
Woodside, CA 94062
(415) 851-4928

Drusilla Souza P.O. Box 411371 San Francisco, CA 94141

Arma and Ed Fonseca 4666 Margery Drive Fremont, CA 94538 (Hm.) 490-0954; (Wk.) 408-727-4000

Rick Parmer
State Parks and Recreation
P.O. Box 34159
San Francisco, CA 94134

Elizabeth Kay
13 Boardwalk, #1
Larkspur, CA 94939

Barry Nelson
Save San Francisco Bay Association
2140 Shattuck
Berkeley, CA 94704

Thomas A. Chiosso
San Francisco Recreation and Parks
Department
McLaren Lodge
Fell and Stanyan Streets
San Francisco, CA 94117

Jane Piereth
Oceanic Society
Fort Mason Center, Building E
San Francisco, CA 94123

George Washington High School Attention: Emil Fogarino 600 - 32nd Avenue San Francisco, CA 94121

Ruben Rodriguez Kaiku' ono Club 284 Sunshine Street Pacifica, CA 94044

Annette Lamont
California State Parks Foundation
P.O. Box 5668
Larkspur, CA 94939

Local, State, and Federal Government/Agency Assistance

City and County of San Francisco

Office of the Mayor Special Assistant to the Mayor City Hall San Francisco, CA (415) 558-3994

Recreation and Parks Department
Information
General Manager
McLaren Lodge
Fell and Stanyan Streets
San Francisco, CA
(415) 558-3706

Planning Department
Director
100 Larkin Street
San Francisco, CA
(415) 558-3050

Public Works Department Traffic Engineer 460 McAllister San Francisco, CA (415) 558-3371

Bureau of Engineering
Division of Engineers of Recreation & Parks
45 Hyde Street, Room 308
San Francisco, CA
(415) 558-4757

San Francisco Clean Water Program
Executive Director
Project Manager
770 Golden Gate Avenue, 3rd Floor
San Francisco, CA 94102
(415) 558-2131

Real Estate Department
Director of Property
25 Van Ness Avenue
San Francisco, CA
(415) 558-3591

:

Housing Authority 1815 Egbert San Francisco, CA 94124 (415) 468-3800 Redevelopment Agency 939 Ellis Street San Francisco, CA 94109 (415) 771-8800

Board of Supervisors City Hall San Francisco, CA (415) 558-3184

Arts Commission
Administration and Info., (415) 558-3463
State, Local Programs, (415) 558-2010
Neighborhood Arts Program, (415) 558-3463

Assessor's Office
City Hall
San Francisco, CA
(415) 558-4011
General Info: (415) 558-3931

San Francisco Conservation Corps
- Fort Mason Center
San Francisco, CA
(415) 928-7322

Sheriff's Department
Administrative Office - (415) 558-2411

Work Furlough Center 930 Bryant San Francisco, CA (415) 553-1654

Waden Branch 5075 Third San Francisco, CA (415) 468-1323

Bay Area Non-Profit Corporations

San Francisco Planning and Urban Renewal Association (SPUR)
Board of Directors
312 Sutter Street, Suite 500
San Francisco, CA 94108
(415) 781-8726

Association of Bay Area Governments P.O. Box 2050
101 8th Street
Oakland, CA 94604
(415) 464-7900

Neighboring Community Organizations

- Bay View Hunters Point Foundation Administrative Offices 6025 3rd Street San Francisco, CA 94124 (415) 822-1124
- Bay View Hunters Point
 Multipurpose Senior Center
 1704 Yosemite Avenue
 San Francisco, CA 94124
 (415) 822-1595
- Bayview Industrial Park 1335 Griffith San Francisco, cA 94124
- Bayview Merchants Association New Bay View Newspaper 6220 3rd Street P.O. Box 24505 San Francisco, CA 94124 (415) 467-1070
- Bay View Federal Savings and Loan 4947 3rd Street San Francisco, CA 94124 (415) 822-7855
- Business Development Incorporated 1485 Bayshore Boulevard, Suite 352 San Francisco, CA 94124
- Young Community Developers 1715 Yosemite Avenue San Francisco, CA 94124
- Valley United/Visitacion Valley 50 Raymond Avenue San Francisco, CA 94134
- Executive Park Advisory Committee 333 Bush Street, Suite 2020 San Francisco, CA 94104
- Sunnydale Project Advisory Committee 770 Golden Gate AVenue, 3rd Floor San Francisco, CA 94102
- Police Community Relations
 Hall of Justice
 850 Bryant
 San Francisco, CA 94103

Neighborhood Cities

City of Brisbane
Planning Department
44 Visitacion Avenue
Brisbane, CA 94005
(415) 467-4180
or
(415) 467-1514

City of Colma
City Manager
235 El Camino Rd.
Colma, CA
(415) 755-6140

Daly City
City Hall Information
333 - 90th
Daly City, CA 94105
(415) 991-8000

Community Development and Planning 90th and Sullivan Avenue Daly City, CA 94105 (415) 991-8033

City of South San Francisco
Planning Department
City Hall
400 Grand Avenue
South San Francisco
(415) 877-8535

City of Oakland
Office of the Mayor
#1 City Hall Plaza, Room 302
Oakland, CA 94612
(415) 273-3141

Office of Parks and Recreation 1520 Lakeside Drive Oakland, CA 94612 (415) 273-3091

County of San Mateo

County Government Center
Redwood City, CA 94063
Planning Department - (415) 363-4161
Parks and Recreation Dept. - (415) 363-4021

State of California

California Arts Council
1901 Broadway, Suite A
Sacramento, CA 95818-2492
Information: ATSS 485-1530; (916) 445-1530

Department of Transportation
District 4
150 Oak Street
San Francisco, CA 94102
(415) 557-1497

Office of the State Architect
Sacramento Headquarters
1500 Fifth Street
Sacramento, CA 95811

Information Desk - ATSS 485-2163; (916) 445-2163

Construction Services - Oakland Area Office 111 Jackson Street, Room 4020 Oakland, CA 94607 (415) 464-1393

Coastal Conservancy 1330 Broadway, Suite 1100 Oakland, CA 94612 ATSS 561-1015; (415) 464-1015

Department of Conservation 1416 Ninth Street, 13th Floor Sacramento, CA 95814 Information: ATSS 492-7683; (916) 322-7683

California Conservation Corps
1530 Capitol Avenue
Sacramento, CA 95814
General Information: ATSS 485-8183; (916) 445-8183
Toll-Free: 800-952-5522

California Coastal Commission 631 Howard Street, 4th Floor San Francisco, CA 94105 Headquarters - ATSS 544-8555; (415) 543-8555

San Francisco Bay Conservation and Development Commission (BCDC) 30 Van Ness
San Francisco, CA 94102
Information: ATSS 597-3686; (415) 557-3686

State Lands Commission 1807 - 13th Street Sacramento, CA 95814 Information: ATSS 492-7777; (916) 322-7777 Department of Forestry 1416 Ninth Street Sacramento, CA 95814 Information: ATSS 485-9920; (916) 445-9920 Planning - ATSS 492-4898; (916) 322-4898

Department of Parks and Recreation
Headquarters
1416 Ninth Street
P.O. Box 942896
Sacramento, CA 94295-0001
General Information: ATSS 485-6477; (916) 445-6477

Central Coast Region 2211 Garden Road Monterey, CA 93940 ATSS 587-2840; (408) 649-7840

San Francisco District P.O. Box 34159 San Francisco, CA 94134 ATSS 597-4069; (415) 557-4069

State Legislators

Senator Milton Marks 350 McAllister Street, Room 2043 San Francisco, CA 94102 ATSS 597-1437; (415) 557-1437

Senator Quentin Kopp
State Capitol, Room 4076
363 El Camino Real
South San Francisco, cA 94080
(415) 952-5666

Assemblyman Art Agnos - State Capitol, Room 3151 350 McAllister, Room 1068 San Francisco, CA 94102 ATSS 597-2253; (415) 557-2253

Assemblyman Willie Brown - State Capitol, Room 217 540 Van Ness Avenue, #14 San Francisco, CA 94102 ATSS 997-0784; (415) 557-0784

Federal Agencies

Army Corps of Engineers
211 Main
San Francisco, CA 94111
Information: (415) 974-0429
Planning-Engineering: (415) 974-0373
Environmental Branch: (415) 974-0443
Permits (North Bay); (415) 974-0413

Department of the Navy Hunters Point Shipyard Hunters Point Site Bldg. 813 San Francisco, CA 94135

Department of Agriculture Forest Service 630 Sansome San Francisco, CA (415) 556-0122

Department of the Interior National Park Service 450 Golden Gate Avenue San Francisco, CA (415) 556-4122

Public Transportation Assistance

Metropolitan Transportation Commission 101 8th Street Oakland, CA 94604 (415) 464-7700

San Francisco Municipal Railway (MUNI) 949 Presidio Avenue, Room 204 San Francisco, cA 94115 (415) .673-6864

San Mateo County Transit District 400 South El Camino Real, Room 400 San Mateo, CA 94402 (415) 348-8858

Golden Gate Bridge, Highway and Transportation District P.O. Box 900
Presidio Station
San Francisco, CA 94129
(415) 921-5858

Non-Profit Groups

Friends of Candlestick Point P.O. Box 34159 San Francisco, CA 94134 (415) 557-40069

Friends of Urban Forest 512 2nd San Francisco, CA 94107 (415) 543-5000

People for Open Space 512 2nd San Francisco, CA 94107 (415) 543-4291 Friends of the Earth 1045 Sansome San Francisco, CA 94111 (415) 433-7373

Friends of the Arts 540 Van Ness San Francisco, CA (415) 621-2787

People's School of Dramatic Arts Fort Mason Center San Francisco, CA (415) 885-2766

People's Theater Coalition Fort Mason Center San Francisco, CA (415) 776-8999 (415) 885-2790

Potrero Hill Neighborhood House - 953 DeHaro Street San Francisco, CA 94107 (415) 826-8080

<u>Others</u>

Gamefield Concepts
50 Francisco Street
San Francisco, CA 94133
(415) 781-7100

Campeau Corporation
5 Thomas Mellon Circle
San Francisco, CA 94134
Phone:

Artists for Candlestick

Leonard Hunter 1352 Irving Street San Francisco, CA 94122 (415) 665-5881

David Ireland 500 Capp Street San Francisco, CA 94110 (415) 647-9640

Lisa Hein 977 Shotwell San Francisco, CA 94110 John Roloff 2020 Livingston Oakland, CA 94606 (415) 261-9196

Martha Schwartz 2140 Bush Street, #5 San Francisco, CA 94115 (415) 922-4535

Claudia Chaplain California Arts Council 1901 Broadway, Suite A Sacramento, CA 95818-2492 (916) 445-1530

Bill and Mary Buchen 223 E. 2nd Street New York, NY 10009 (212) 982-1743

Lewis Baltz Box 42 Sausalito, CA 94966 (415) 332-4200

Alain Gerbault Peter Samis 49 Edgecroft Kensington, CA 94707

Media Contacts

San Francisco Chronicle

- Bernard Weiher, Theater Critic
- Dale Champion, Environmental Writer
- Margot Patterson Doss, Feature Writer San Francisco, CA 94119 (415) 777-1111

San Francisco Examiner
Nancy Scott, Art/Theater Critic
110 Fifth Street
San Francisco, CA 94120
(415) 777-2424

San Francisco Progress 851 Howard Street San Francisco, CA (415) 982-8022

KPIX Television
Evening Magazine
855 Battery
San Francisco, CA
General Information: (415) 312-5550
Evening Magazine: (415) 765-8600

Arts Community Representatives

Bruce Davis
Cultural Consultant
475 Delores Street
San Francisco, CA 94110
(415) 861-0464

Christine Ebel
Survey Consultant
4125 - 23rd Street
San Francisco, CA 94114
(415) 641-1238

Deborah Allen
Executive Director
Theatre Bay Area
2940 16th Street, Ste. 102
San Francisco, CA 94103
(415) 621-0427

Marilym Bancel
- Director of Development
The Exploratorium
3601 Lyon Street
San Francisco, CA 94123
(415) 563-3200 or 563-7337

Maria Acosta-Colon 867 Treat Street San Francisco, CA 94110

Korana Hattersly-Drayton 231 Palmer Street Petaluma, CA 94952

Quentin Easter
General Manager
Lorraine Hansberry Theatre
1668 Bush Street
San Francisco, CA 94109
(415) 474-8842

James Farley
General Manager
Marin Center
San Rafael, CA 94903

Kim Fowler
Assistant Administrator
San Francisco Hotel Tax Fund
Room 289, City Hall
San Francisco, CA 94102

Mlinzi Majigiza
General Manager
Dimensions Dance Theater
606 60th Street
Oakland, CA 94609

Indra Mungal
Ethnic Dance Festival
Fort Mason, Bldg. A
San Francisco, CA 94123

Peter Richards
Assistant Director
The Exploratorium
3601 Lyon Street
San Francisco, CA 94123
(415) 563-7337

Laird Rodet
Executive Director
Margaret Jenkins Dance Co.
3153 17th Street
San Francisco, CA 94110
(415) 863-1173

Kary Schulman
Administrator
San Francisco Hotel Tax Fund
Room 289, City Hall
San Francisco, CA 94102

Anne Smith 232 Precita San Francisco, CA 94102 (415) 826-1542

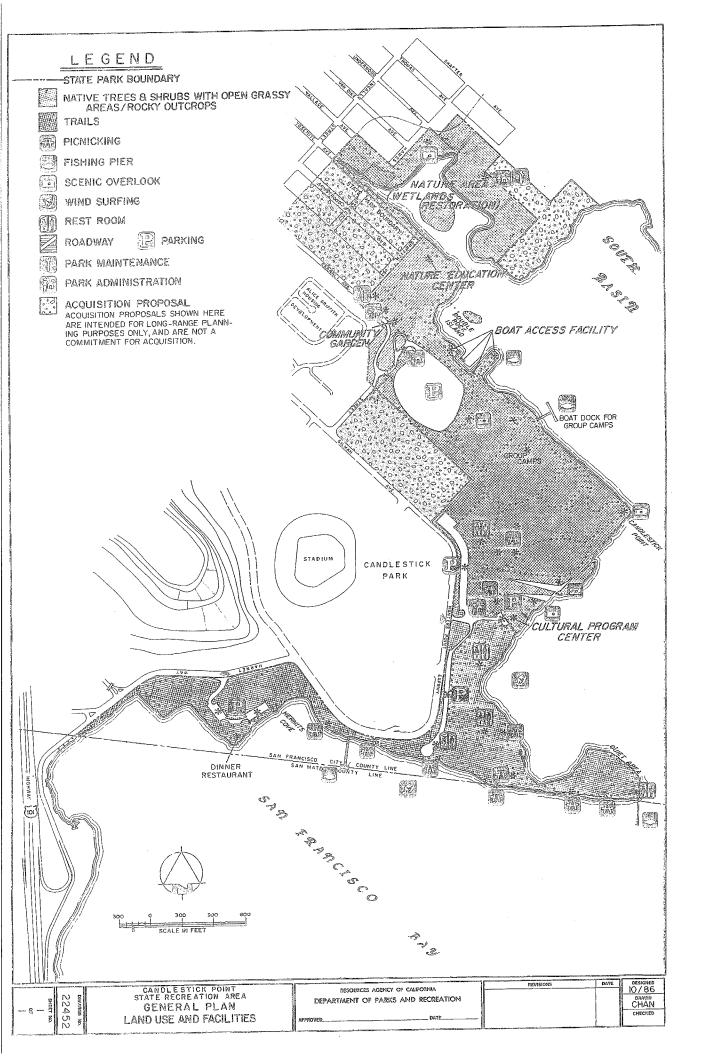
Peggy Sneider
General Manager
Pickle Family Circus
400 Missouri Street
San Francisco, CA 94107
(415) 826-0747

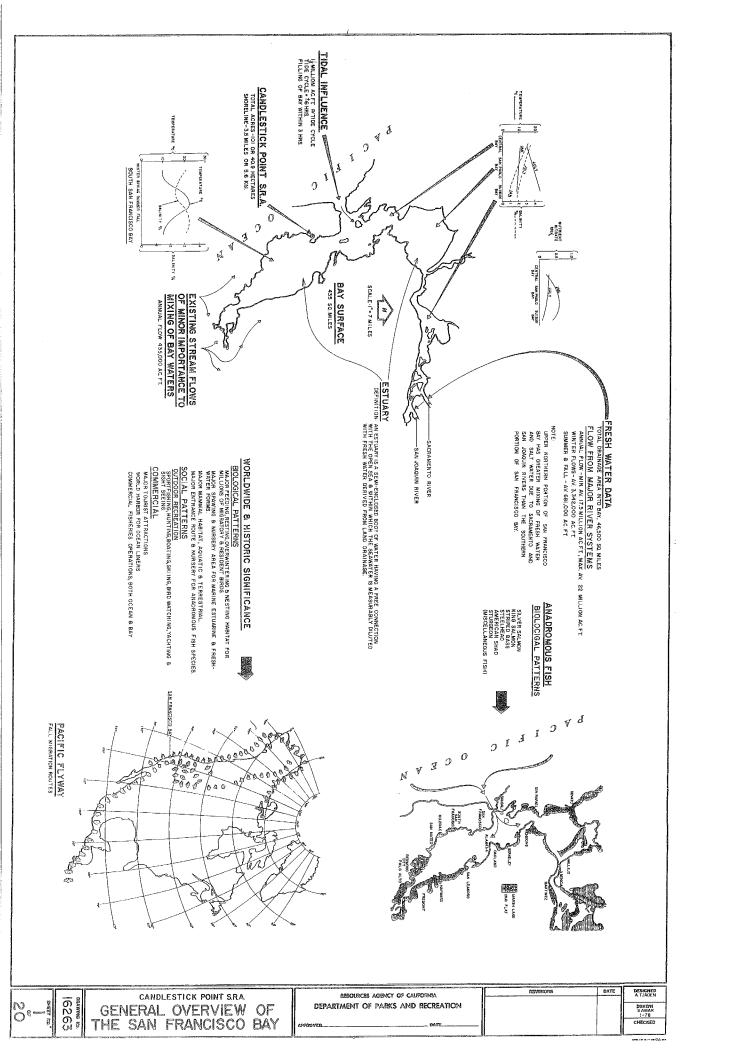
Eva Soltes
P.O. Box 7266
Berkeley, CA 94709

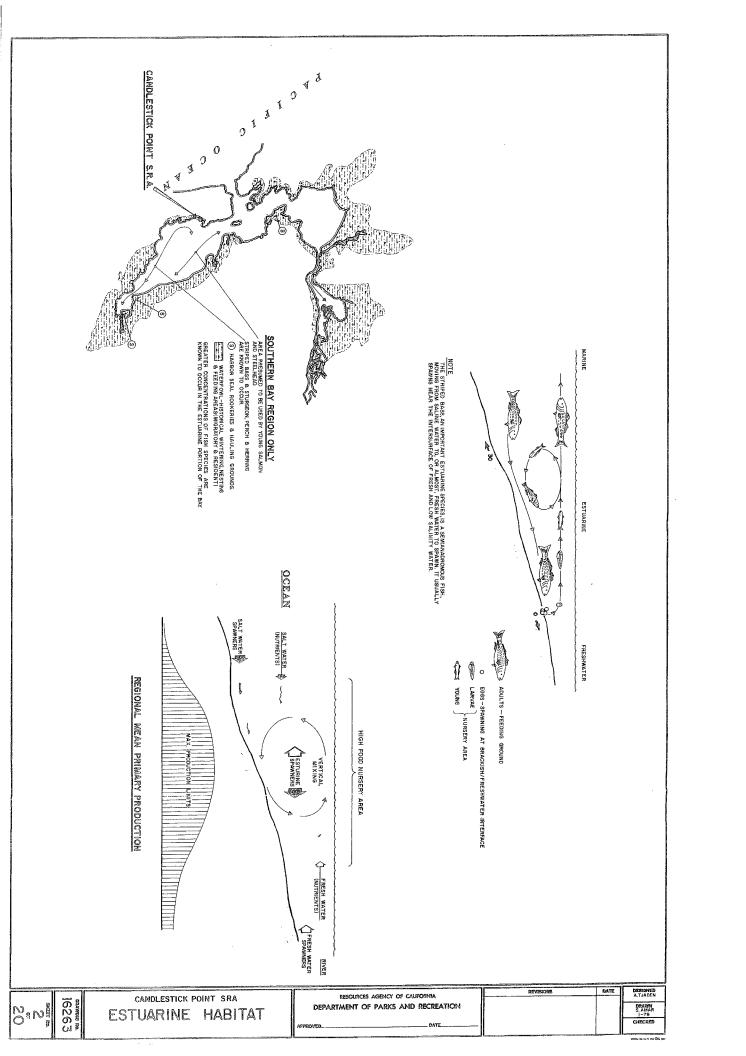
Anna Sun
Artistic Director
Asian American Dance Collec.
1519 Mission Street
San Francisco, CA 94103
(415) 552-8980

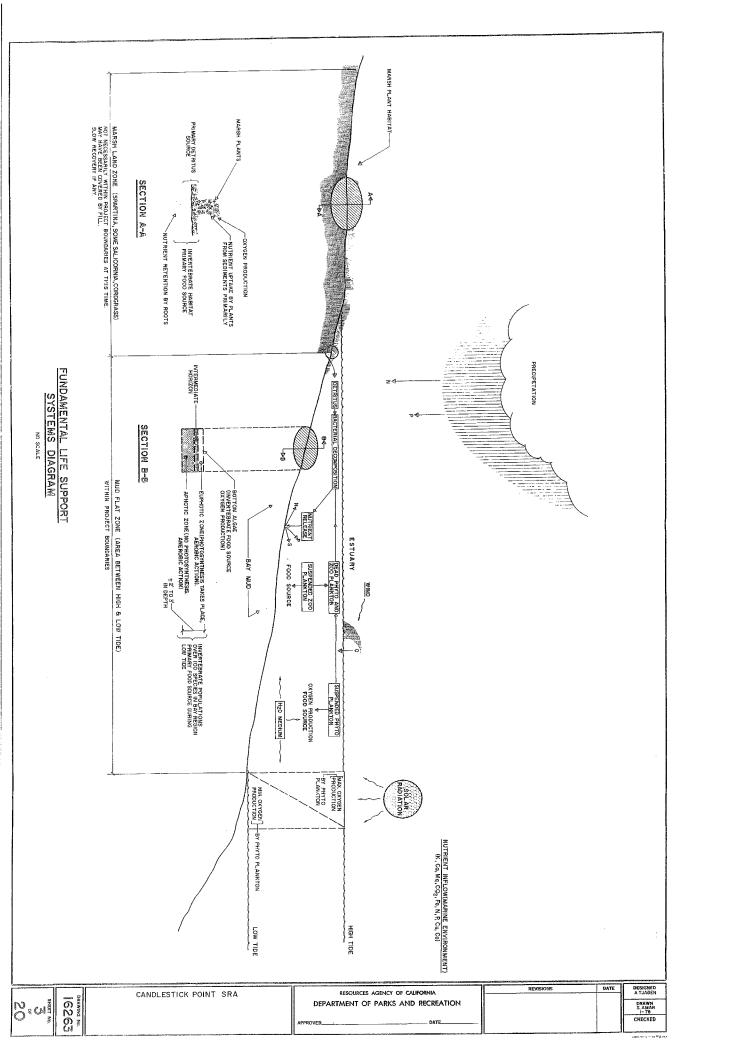
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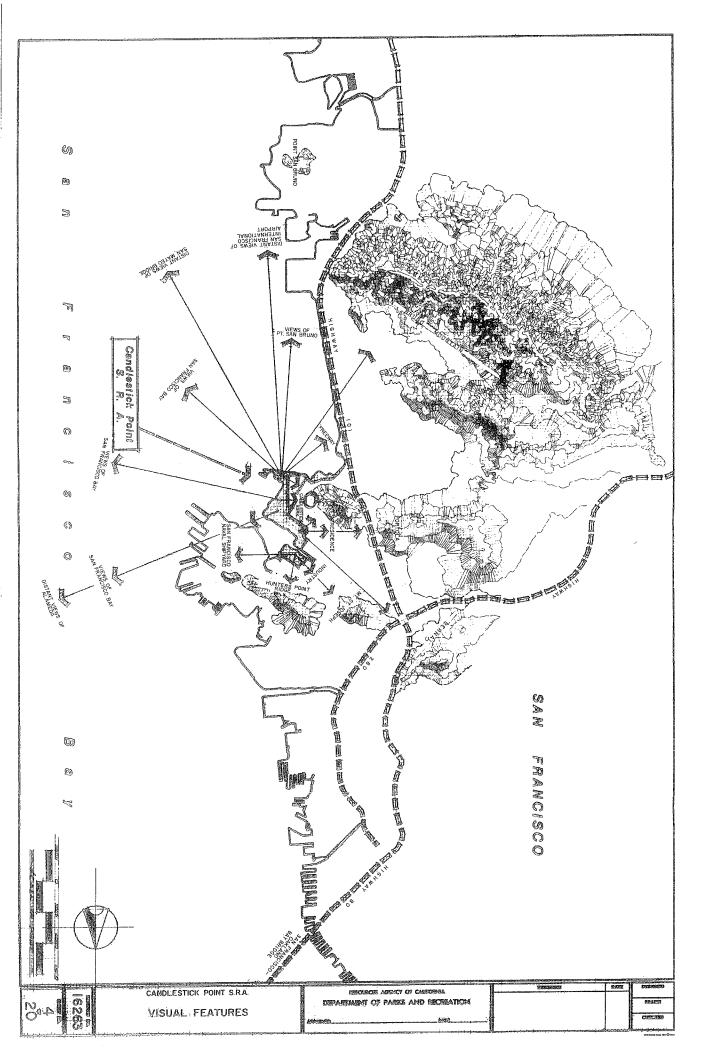
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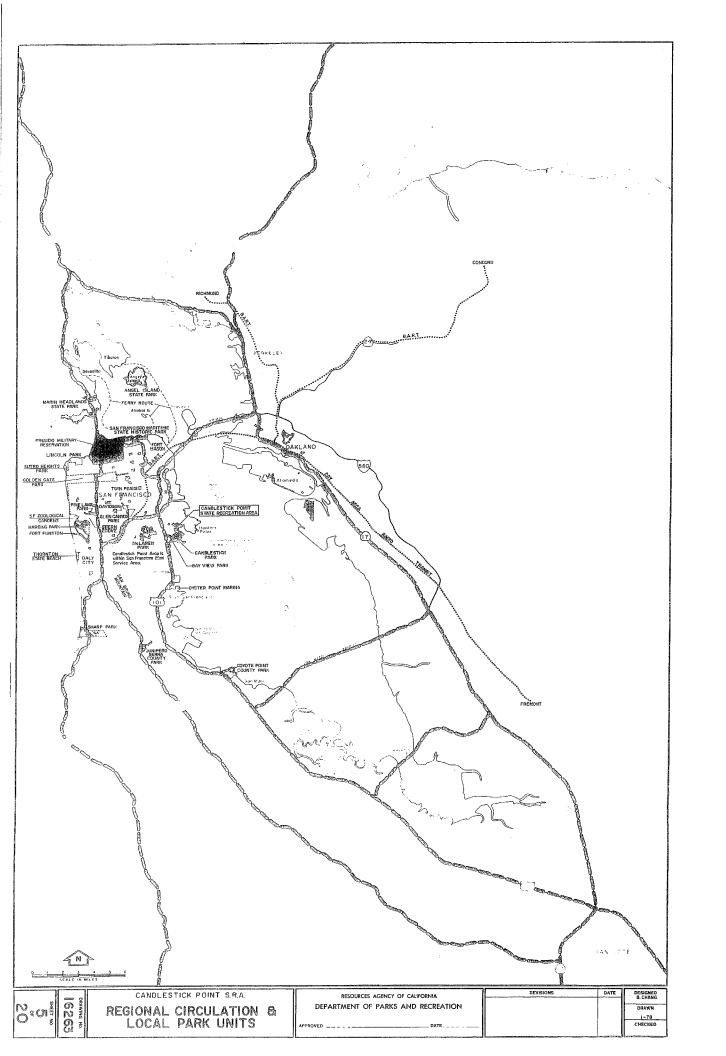


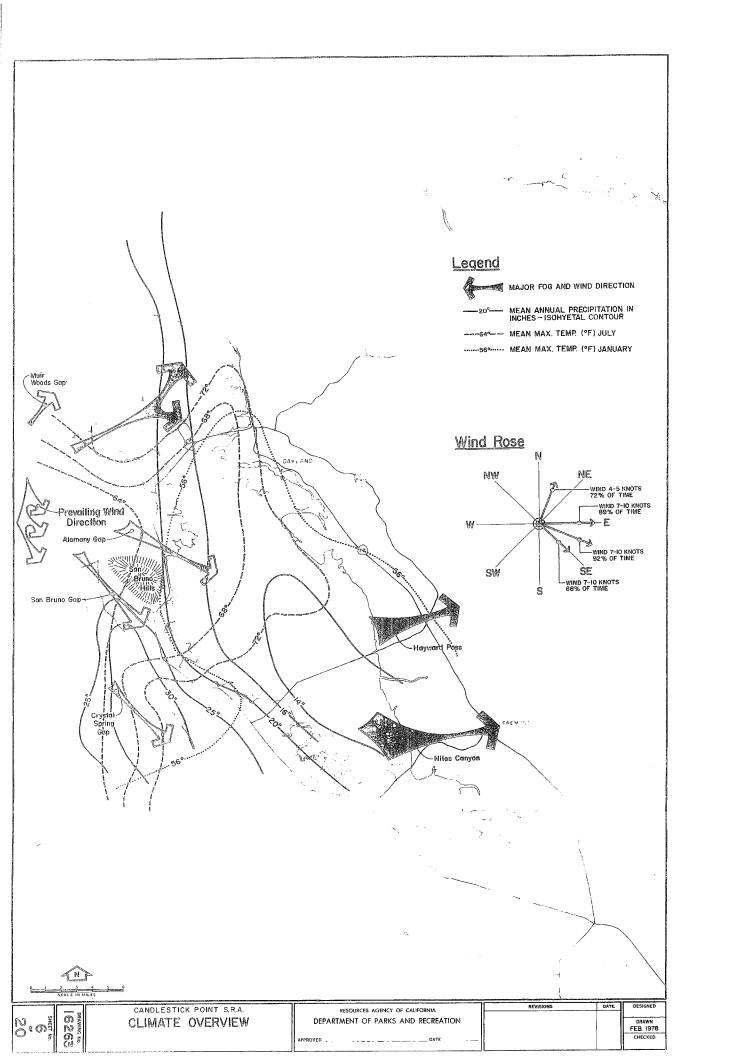


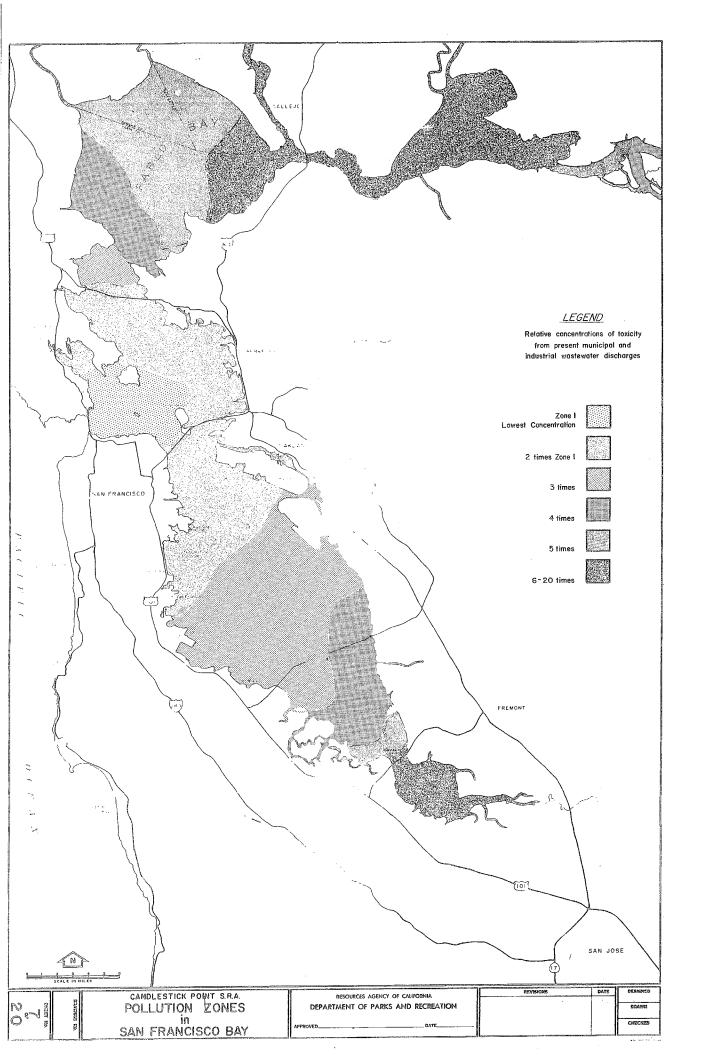


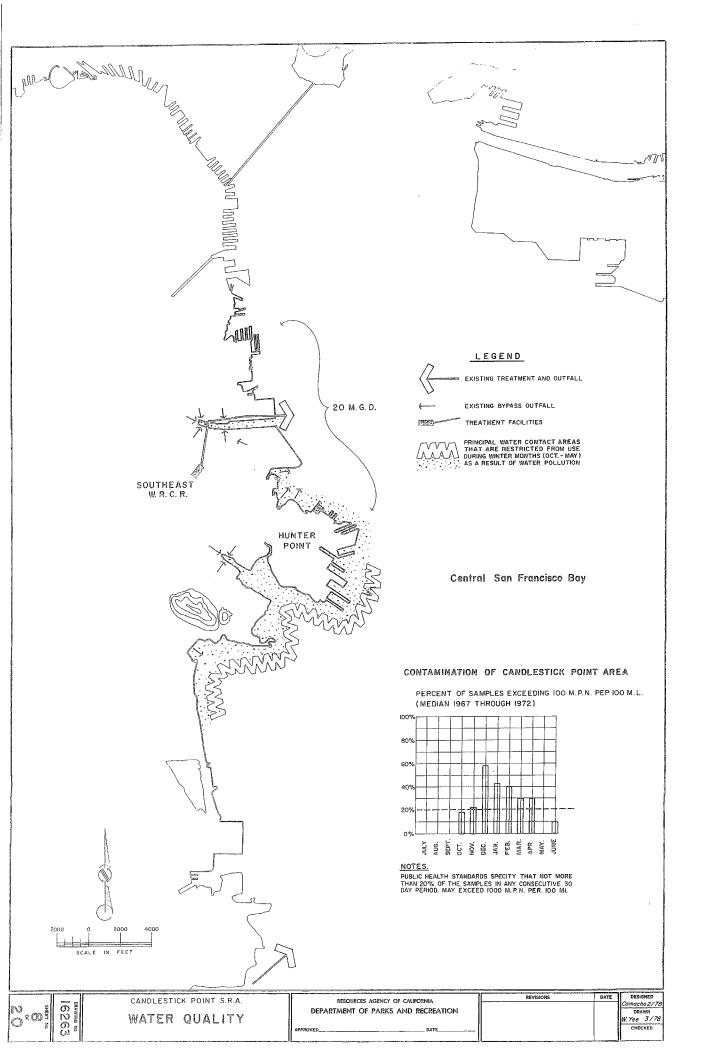


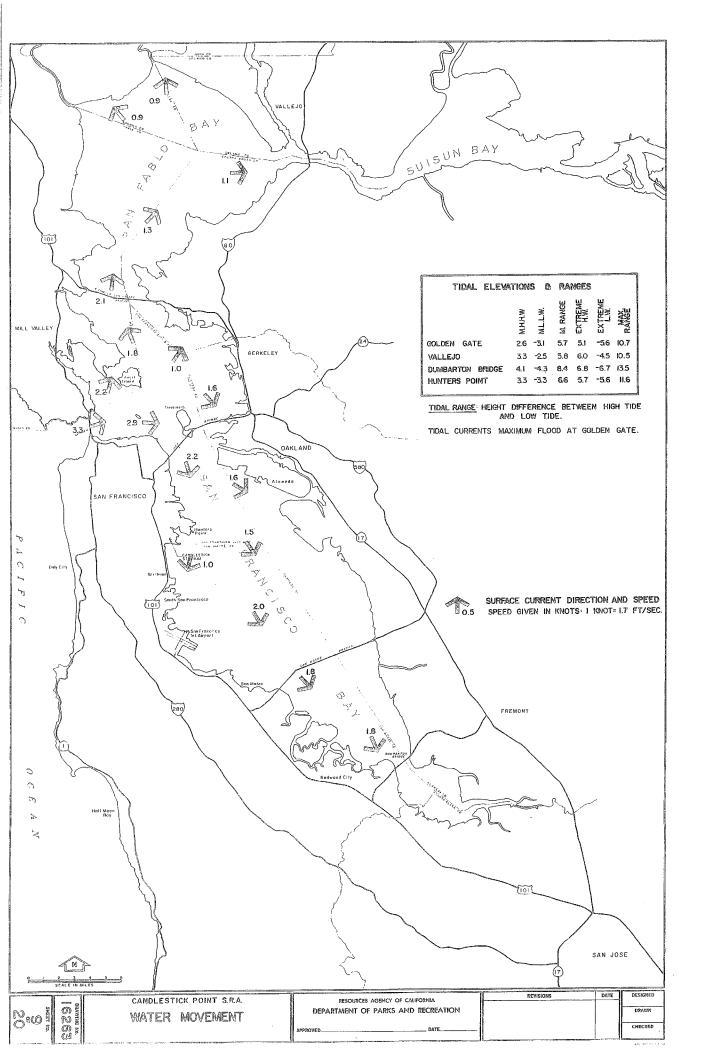


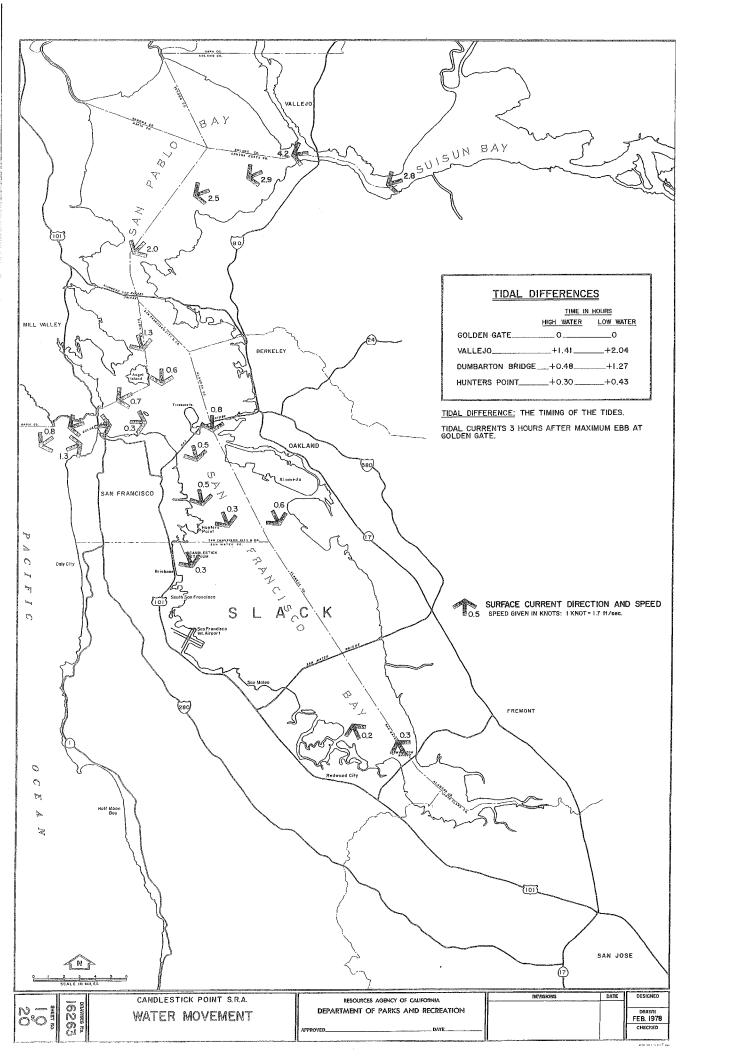


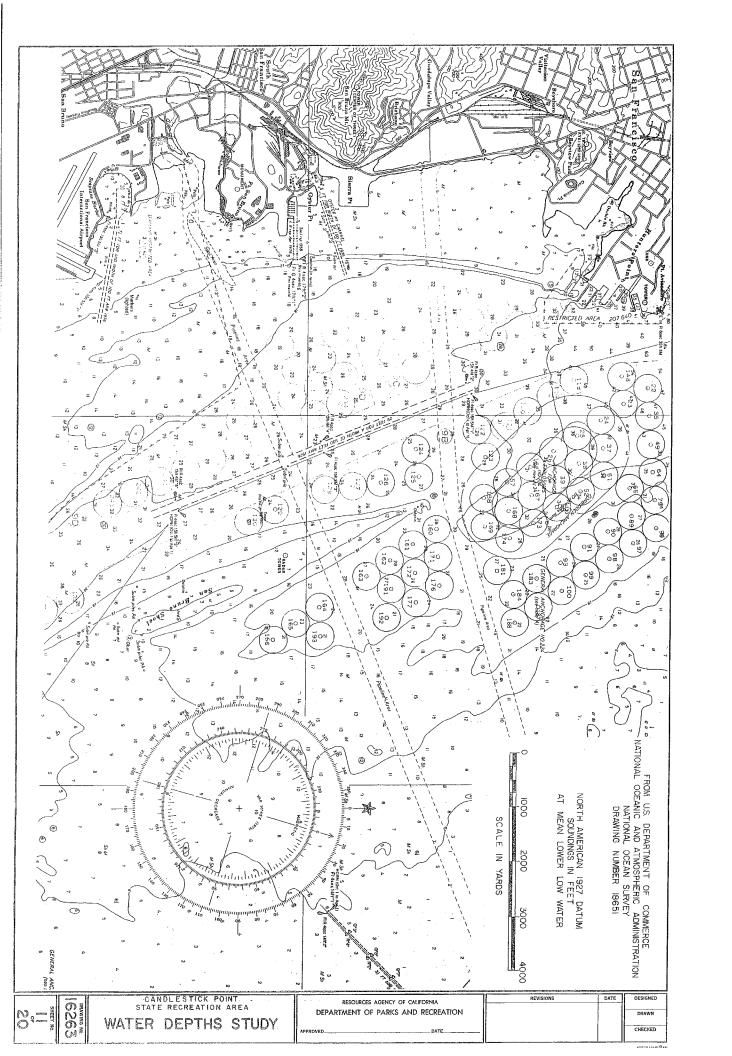


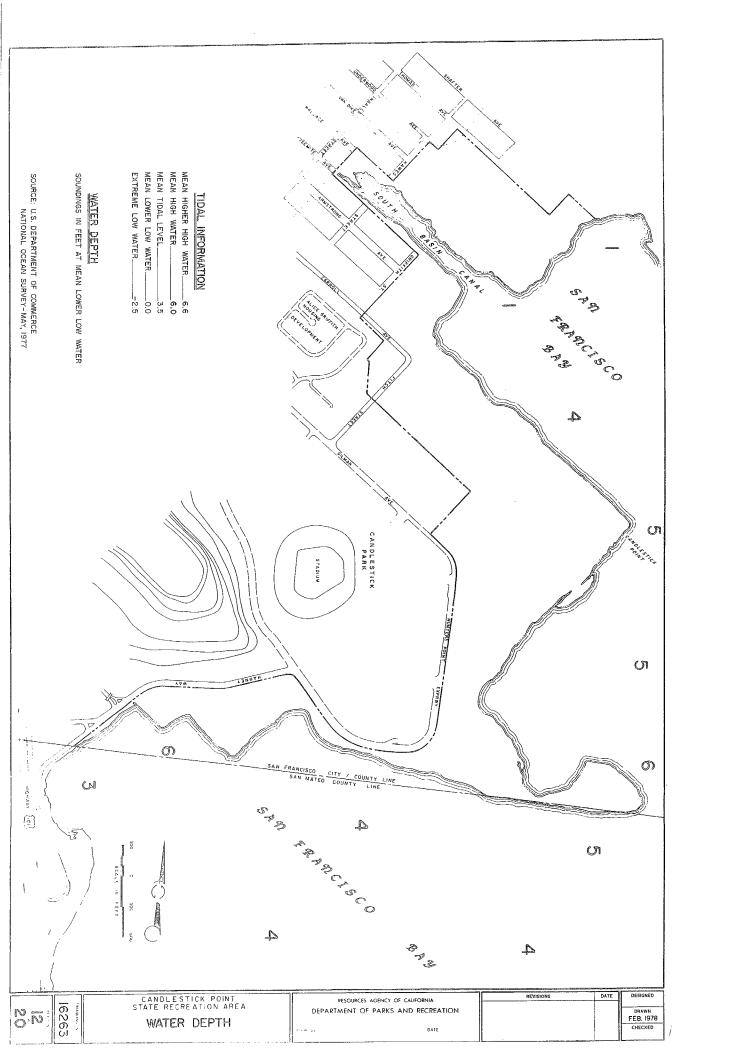












HOW THE SAN FRANCISCO BAY REGION WAS FORMED

		PRESENT	Ç.
BAY TROUGH FILLED WITH SEDIMENTS FROM GLACIER MELT WATERS FORMING PRESENT DAY "BAY MUD" AND SEA WATER LEVEL.	WISCONSIN GLACIATION		<u>ក</u> ច
HEATS INFO BAY CORPIDERATION. THE TABLE THYPE ARED HER RESTRICT WHILE THE PROPERTY HER WHILE THE DEPRESSED EASTERN EDGE PRODUCED THE BAY TROUGH.	GLACIATION		- 10 V 19 T T
WARPING AND FAULTING OF SAN FRANCISCO-MARIN "TABLE" PRODUCED	PLEISTOCEME	I MILLION	d
RIDGES FORMED ROUNDED HILLS.	PLIOCENE	5 MILLION	utos médic
EROSION TO EAST AND WEST OF NEWLY FORMED HIGH STANDING	MIOCENE	15 MILLION	Manino
EARTH MOVEMENT IN NORTH-WESTERLY TRENDING PATTERN FORMED COAST RANGE THROUGH FOLDS (BENDS) AND FAULTS (BREAKS).	TERTIARY		
SEDIMENTS DEPOSITED ON BEDROCK FORMED SHALE AND SANDSTONE.	KNOXVILLE	70 MILLION	2201112
FRANCISCAN FORMATIONS DEPOSITED IN DEEP NARROW TROUGHS PRODUCED PRESENT DAY EXPOSED BEDROCK. (DEPTH ESTIMATED FROM ID,000 TO 50,000 FEET THICK.)	CRETACEOUS	180 MILLION	· · · · · · · · · · · · · · · · · · ·
OLDEST ROCKS KNOWN IN THE BAY AREA FORMED BEDROCK "BASEMENT COMPLEX"	JURRASIC	MILLION MILLION	ر.
EVENT	GEOLOGIC TIME	YEARS AGO	TIME

GEOLOGIC SIGNIFICANCE

I NATURAL ENVIRONMENT

- -THE GEOLOGIC FORMATION OF THE BAY REGION IN PREHISTORIC TIMES FOUNDED THE BASIC ELEMENTS FOR COMPLEX ECO-SYSTEMS.
- -SINCE PREHISTORIC TIMES TO THIS DATE THE BAY AREA HAS BEEN KNOWN TO BE ONE OF THE MOST ACTIVE SEISMIC ZONES IN THE WORLD.

2. SOCIAL ENVIRONMENT

-THE PRIME ESTUARY CONTAINING AN OPTIMUM FOOD GATHERING SOURCE PROVIDED A BASE FOR AN URBAN SOCIAL ENVIRONMENT.

STRUCTURAL SITE CONSIDERATIONS

SEISMIC

EARTHQUAKE EFFECTS

-SHAKING OF THE GROUND

--GROUND FAILURES
SLIDES
COMPACTION
LIQUEFACTION
LURCHING

-INUNDATION
SEICHES (WATER OSCILLATION)
TSUNAMIS (LARGE WAVE)

-SURFACE FAULTING (BREAKING OF THE GROUND)

EXISTING UNSTABLE SOIL

MAN-MADE FILL

-SUBSIDENCE AND DIFFERENTIAL SETTLEMENT DECOMPOSITION OF FILL METHOD OF FILL

-LANDSLIDING AND SLOPE INSTABILITY

SOFT BAY MUD

-SUBSIDENCE AND DIFFERENTIAL SETTLEMENT WEAK SOIL PROPERTIES (FEAT LENSE) SAND LENSES—NOW-UNFORMITY OF SOIL STRATA SURCHARGE LOADS

-LANDSLIDING AND SLOPE INSTABILITY EMBANKMENTS OR MOUNDS EXCAVATIONS OR CUTS -DOWN-DRAG ON PILE FOUNDATIONS

3. OTHER CONSIDERATIONS

MAN-MADE

- VIBRATION SOUND (FREEWAY, AIRCRAFT) BLASTING (CONSTRUTION)

-WATER
POLLUTION (EXISTING OUTFALLS, RUNOFF)
EROSION

-AIR POLLUTION

-VANDALISM

NATURAL -WIND (PREVAILING WIND FROM SE 7-10 KNOTS, 8-11 MPH)

-PRECIPITATION (16"-20" AVERAGE ANNUAL RAINFALL)

-TEMPERATURE (56°-64° F AVERAGE) -SOLAR EXPOSURE

-OXIDATION (SALT AIR, RUST)

16263

CANDLESTICK POINT STATE RECREATION AREA GEOLOGIC TIME TABLE 8: STRUCTURAL CONSIDERATIONS

RESOURCES AGENCY OF CAUPOINGA DEPARTMENT OF PARKS AND RECREATION JAN 1978

